Nikon

Digital Camera

E3/E3S

Instruction Manual

CE

AF

E

WARNING

WARNING **To reduce the risk of fire or electric shock, do not expose this product to rain or moisture.**

CAUTION
RISK OF ELECTRIC SHOCK
DO NOT OPEN
CAUTION: TO REDUCE THE RISK OF ELECTRIC SHOCK,
DO NOT REMOVE COVER (OR BACK).
NO USER-SERVICEABLE PARTS INSIDE.
REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.

This symbol is intended to alert the user to the presence of uninsulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.

This symbol is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

For customers in the U.S.A.

Federal Communications Commission (FCC) Radio Frequency Interference Statement

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

—*Reorient or relocate the receiving antenna.*
—*Increase the separation between the equipment and receiver.*
—*Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.*
—*Consult the dealer or an experienced radio/TV technician for help.*

Modifications

The FCC requires the user to be notified that any changes or modifications made to this device that are not expressly approved by Nikon Corporation may void the user's authority to operate the equipment.

SCSI cables

Please use optional SCSI cables. Other interface cables may exceed the limits specified for Class B devices in Part 15 of the FCC regulations.

Notice for customers in Canada

CAUTION

This Class B digital apparatus meets all requirements of the Canadian Interference-Causing Equipment Regulations.

ATTENTION

Cet appareil numérique de la classe B respecte toutes les exigences du Règlement sur le matérial brouilleur du Canada.

EC DECLARATION OF CONFORMITY

We

Name: Nikon Europe B.V.

Address: Schipholweg 321, 1171 PL Badhoevedorp P.O. Box 222, 1170 AE Badhoevedorp, THE NETHERLANDS

declare that the product

Product Name: Nikon Digital Camera E3/E3s

Manufacturer's Name: Nikon Corporation

Manufacturer's Address: Fuji Bldg., 2-3, Marunouchi 3-chome, Chiyoda-ku, Tokyo 100-8331, Japan

is in conformity with the following Standards

Safety: EN60950

EMC: EN55022: 1994 + amendment 1: 1995 Class B
EN61000-3-2:1995
EN61000-3-3:1995
EN50082-1
IEC801-2: 1991 4kV (direct discharge) 8kV (air discharge)
IEC801-3: 1984 3V/m
IEC801-4: 1988 1kV AC, 0.5kV I/O

following the provisions of the EMC Directive (89/336/EEC) and the Low Voltage Directive (73/23/EEC).

DECLARATION DE CONFORMITE DE LA CEE

Nous

Nom: Nikon Europe B.V.

Adresse: Schipholweg 321, 1171 PL Badhoevedorp P.O. Box 222, 1170 AE Badhoevedorp, THE NETHERLANDS

déclarons que ce produit

Nom du produit: Nikon appareil photo numérique E3/E3s

Nom du fabricant: Nikon Corporation

Adresse du fabricant: Fuji Bldg., 2-3, Marunouchi 3-chome, Chiyoda-ku, Tokyo 100-8331, Japan

est conforme aux normes suivantes

Sécurité: EN60950

EN61000-3-3:1995
EN50082-1
IEC801-2: 1991 4kV (décharge direct) 8kV (décharge d'air)
IEC801-3: 1984 3V/m
IEC801-4: 1988 1kV AC, 0,5kV I/O

selon les dispositions de la directive de la CEE (89/336/EEC) et de la directive Basse tension (73/23/EEC).

ERKLÄRUNG ÜBER EG-NORMENGERECHTHEIT

Wir

Name: Nikon Europe B.V.

Anschrift: Schipholweg 321, 1171 PL Badhoevedorp P.O. Box 222, 1170 AE Badhoevedorp, THE NETHERLANDS

erklären hiermit, daß das folgende Produkt

Produktbezeichnung: Nikon Digital Camera E3/E3s

Name des Herstellers: Nikon Corporation

Anschrift des Herstellers: Fuji Bldg., 2-3, Marunouchi 3-chome, Chiyoda-ku, Tokyo 100-8331, Japan

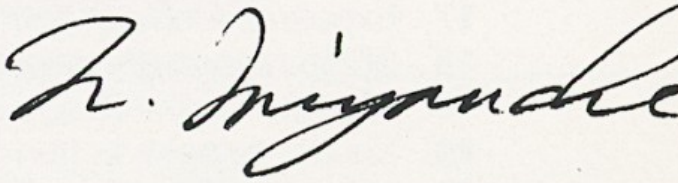
den nachstehend aufgeführten Normen genügt:

Sicherheit: EN60950

EMC: EN55022: 1994 + Zusatz 1: 1995 Klasse
EN61000-3-2:1995
EN61000-3-3:1995
EN50082-1
IEC801-2: 1991 4kV (direkte Entladung) 8kV (Luftentladung)
IEC801-3: 1984 3V/m
IEC801-4: 1988 1kV AC, 0,5kV I/O

und zwar gemäß den Bestimmungen der EMC-Richtlinie (89/336/EEC) und der Niederspannungs-Richtlinie (73/23/EEC).

Badhoevedorp
THE NETHERLANDS June 1, 1998



Place	Date	Signature/President
Lieu	Date	Signature/Président
Ort	Datum	Unterschrift/Präsident

surface.
This may damage the camera's precision mechanisms. Also do not touch the front or rear lens surfaces and never apply force to the lens or camera body.

Take care not to get water on the camera.

If the camera gets wet, parts may corrode, increasing repair costs; in extreme cases, repair may be impossible.

Notes on cleaning

Use a blower to remove dust from the camera, lens, and eyepiece ring, then wipe with a soft, dry cloth. If the front or rear lens surfaces are still dirty, use lens tissue and a commercial lens cleaner. Never use rough materials, such as handkerchiefs or your shirt tail, to clean the lens, as this may scratch it.

Avoid extreme changes in temperature

Extreme changes in temperature may cause condensation on the inside and outside of the camera. When moving the camera from a cold to a warm place (or vice versa), keep it inside your camera bag until it has had a chance to adjust to the change in temperature.

Do not use the camera in an environment where strong electric or electromagnetic waves are generated.

Using the camera in an environment subject to strong electric or electromagnetic waves (for example, near a TV antenna or an electrostatically charged object) could result in the lost of recorded image data or may cause the camera to malfunction.

Safekeeping your camera

- If the camera is not going to be used for a long time, remove the Rechargeable Battery Pack and store it in a cool, dry place. We recommend taking the camera out of storage and releasing the shutter a few times at least once a month.
- Store the camera in a cool, dry place to prevent mold. Do not leave it inside an enclosed space exposed to chemicals such as camphor and naphthalene. Do not leave the camera near electronic appliances subject to electromagnetic waves (e.g. TVs and radios). Avoid leaving the camera in hot places such as a car in the summer time or near a heater.

Removing the battery pack or DC Adapter

Be sure the Main dial is set to L (power off) before removing the battery pack or DC Adapter. Otherwise, the camera may malfunction, particularly while shooting or deleting data in memory.

features such as Matrix metering, Autofocus operation and compatibility with Nikon's advanced Speedlight System for Automatic Balanced Fill-Flash, and wireless multiple flash photography. Through its digital technology, images taken and stored on the camera's accessory memory card can be viewed on a compatible computer (PC or Mac) or displayed on a TV monitor; through compatible computer software the images can be enhanced on screen and then printed using optional printing devices. We hope that you will enjoy using this professional Nikon product and that it will help you expand your professional opportunities in photography. We would appreciate hearing about your experience with your new Nikon E3/E3s camera. To ensure that you fully understand the operation of the E3/E3s camera, we urge you to read this manual thoroughly.

About this manual

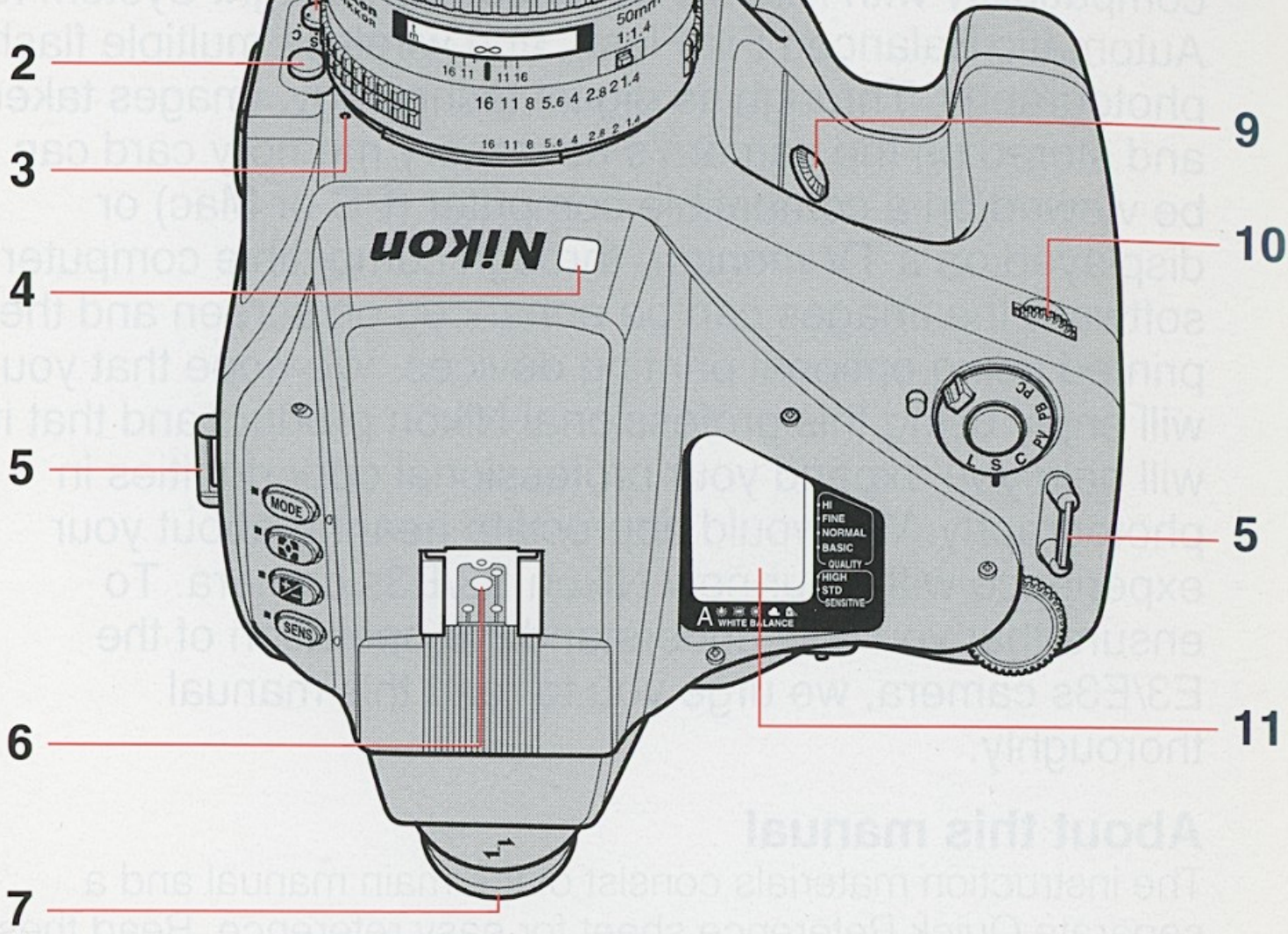
The instruction materials consist of the main manual and a separate Quick Reference sheet for easy reference. Read these manuals thoroughly to make the most of your camera's potential. In the main manual, we begin with instructions on how to prepare the camera for shooting and move on to a variety of basic and advanced photographic techniques using all available functions. In the separate Quick Reference sheet, we explain some basic photographic procedures for taking pictures using the camera's simple and convenient functions.

Marks used in this manual

CAUTION Denotes important points where caution or mandatory action is required.

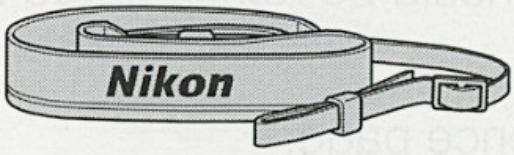
Important Denotes an important point for operation.

NOTE Useful points that should be remembered for future reference.



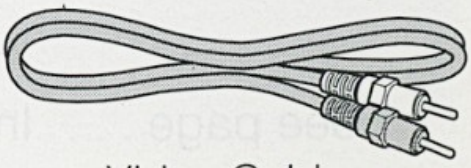
1 Focus mode selector (See page 44.)
2 Lens release button (See page 22.)
3 Lens mounting index (See page 22.)
4 White balance window (See page 40.)
5 Camera strap eyelet
6 Accessory shoe (See page 84.)
7 Eyepiece ring (See page 33.)
8 Sync terminal (See page 85.)
9 Remote terminal (See page 77.)
10 Aperture dial (See page 65.)
11 LCD panel (See page 19.)

Standard accessories

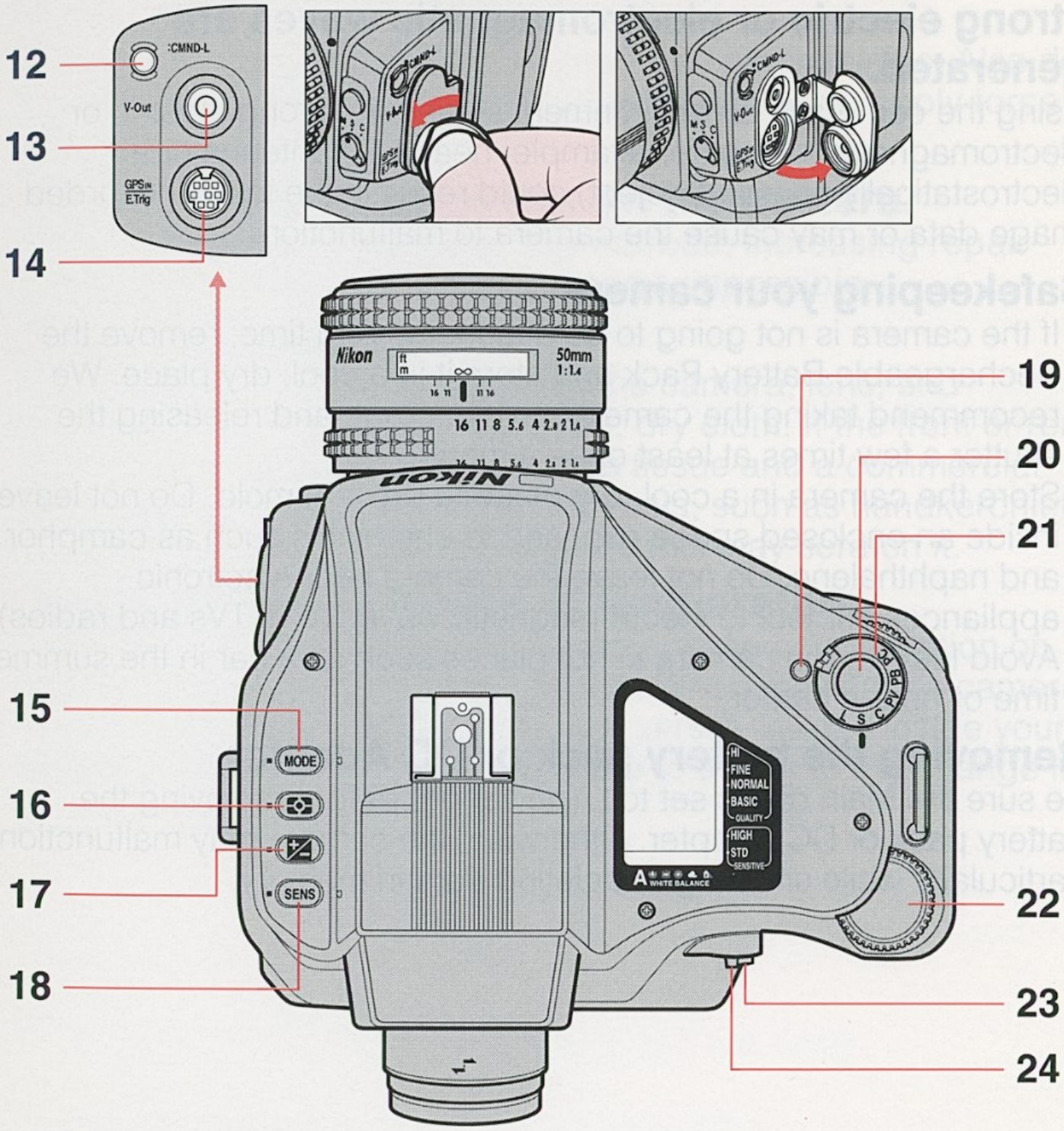


Neckstrap

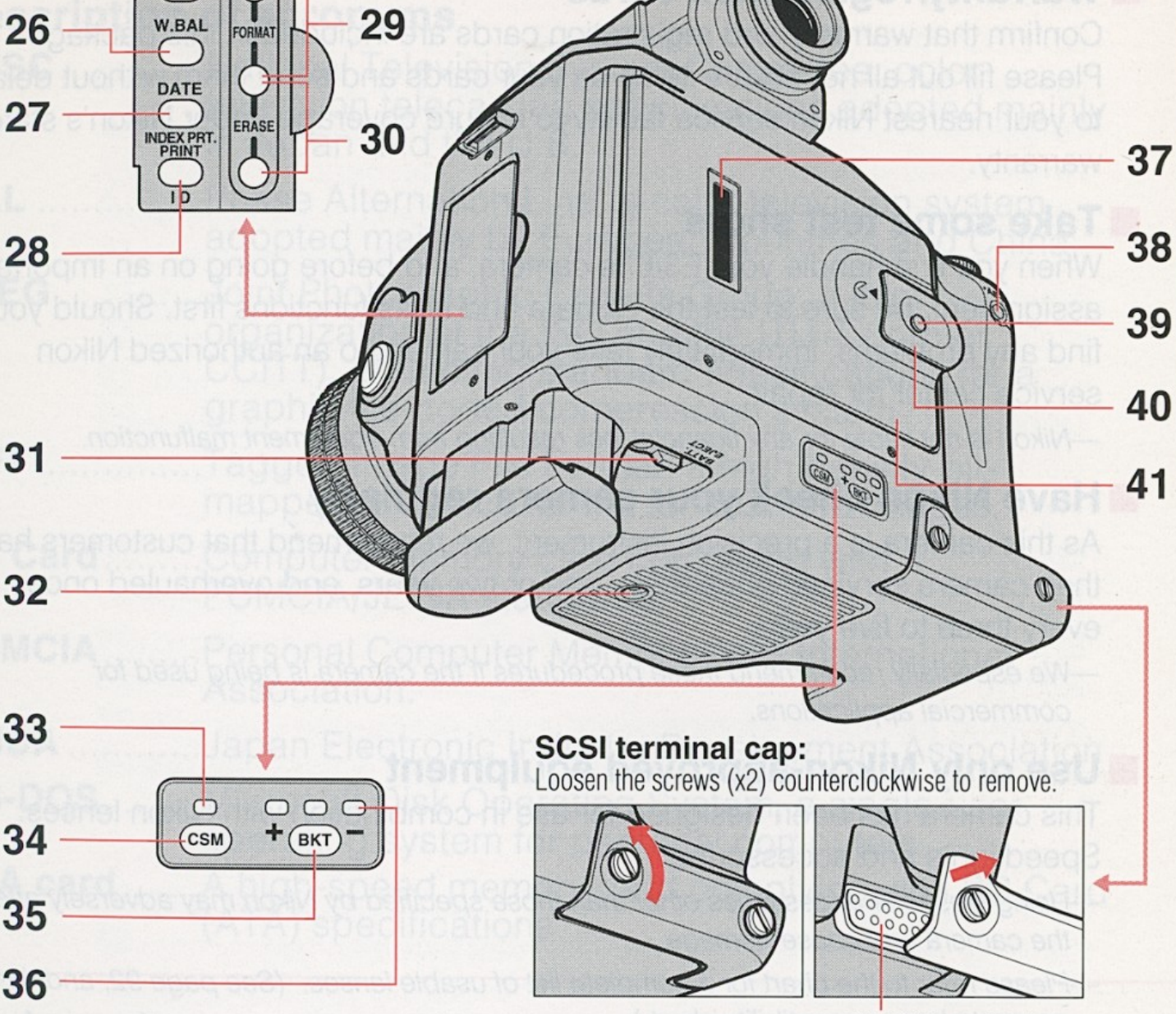
Body cap


Video Cable

Terminal cap:
Loosen the screw counterclockwise to remove.



12 CMND-L (command lock) button (See page 48.)
13 V-Out (Video Output) terminal (See page 49.)
14 GPS IN (input) (See page 82.) / E. Trig. (External Triggering) terminal (See page 76.)
15 MODE (exposure mode) button (See page 37.)
16 Metering system button (See page 38.)
17 Exposure Compensation button (+/–) (See page 70.)
18 SENS (sensitivity selector) button (See page 43.)
19 Main dial lock-release button (See page 36.)
20 Shutter release button (See page 34.)



SCSI terminal cap:
Loosen the screws (x2) counterclockwise to remove.

SCSI terminal
(See page 54.)

25 QUALITY (image quality) button (See page 39.)
26 W. BAL (white balance mode) button (See page 40.)
27 DATE (date setting) button (See page 25.)
INDEX PRT. (index print) button (See page 62.)
28 PRINT (print) button (See page 62.)/User ID number setting button (See page 28.)
29 FORMAT buttons (See page 53.)
30 ERASE buttons (See page 53.)
31 Battery eject lever (See page 23.)
32 Tripod socket
33 Custom settings display LED (See page 78.)
34 CSM (custom settings mode) button (See page 78.)
35 BKT (exposure bracketing) button (See page 74.)
36 Exposure bracketing display LED (See page 74.)
37 Image Memory Card confirmation window (See page 27.)
38 AE-L (Auto Exposure Lock) button (See page 69.)
39 Eject knob lock-release button (See page 26.)
40 Image memory card eject knob (See page 26.)
41 Camera back (incorporating the Image Memory Card slot) (See page 26.)

Please fill out all necessary items on your cards and send them without delay to your nearest Nikon service facility to ensure coverage under Nikon's stated warranty.

Take some test shots

When you first handle your E3/E3s camera, and before going on an important assignment, be sure to test the camera and all its functions first. Should you find any problems, immediately take your camera to an authorized Nikon service center for repair.

—Nikon is not liable for any financial loss resulting from equipment malfunction.

Have Nikon check your camera regularly

As this camera is a precision instrument, we recommend that customers have their camera serviced once every one or two years, and overhauled once every three to five years.

—We especially recommend these procedures if the camera is being used for commercial applications.

Use only Nikon-approved equipment

This camera has been designed for use in combination with Nikon lenses, Speedlights and accessories.

—Using lenses or accessories other than those specified by Nikon may adversely affect the camera and cause damage.

—Please refer to the chart for a complete list of usable lenses. (See page 92, and the separate lens compatibility chart.)

Note on copyright

Television programs, films, video tapes and other materials may be copyrighted. Unauthorized recording of such materials may be contrary to the provisions of the copyright laws.

Description of acronyms

NTSC .....National Television System Committee, color television telecasting specifications adopted mainly in Japan and the U.S.

PAL .....Phase Alternation Line, a color television system adopted mainly by European countries and China.

JPEG .....Joint Photographic Experts Group, a joint organization of the ISO and the ITU-T (former CCITT), promoting standard specifications for a graphic file-coded compression system.

TIFF .....Tagged Image File Format, a high density bit-mapped graphics format for scanned images.

PC Card.....Computer memory card complying with PCMCIA/JEIDA standards.

PCMCIA.....Personal Computer Memory Card International Association.

JEIDA .....Japan Electronic Industry Development Association

MS-DOS.....Microsoft Disk Operating System, a single-user operating system for personal computers.

ATA card.....A high-speed memory card complying with PC Card (ATA) specifications.

Trademarks

MS-DOS and Windows 95 are registered trademarks of Microsoft Corporation.
Apple, Macintosh and PowerBook are registered trademarks of Apple Computer, Inc.
IBM PC/AT is a trademark of International Business Machines Corporation.
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EC DECLARATION OF CONFORMITY 4-5
Camera care tips 6-7
Foreword 8
Nomenclature 9-11
General recommendations 12-13
System chart 16
Major features 17
Viewfinder indications 18
LCD panel indications 19
Dedicated accessories 20

Preparations for taking pictures 21
Mounting and removing the lens 22
Installing and removing the battery 23
Checking battery power 24
Setting date and time 25
Inserting the Image Memory Card 26-27
Setting a user ID number 28-29

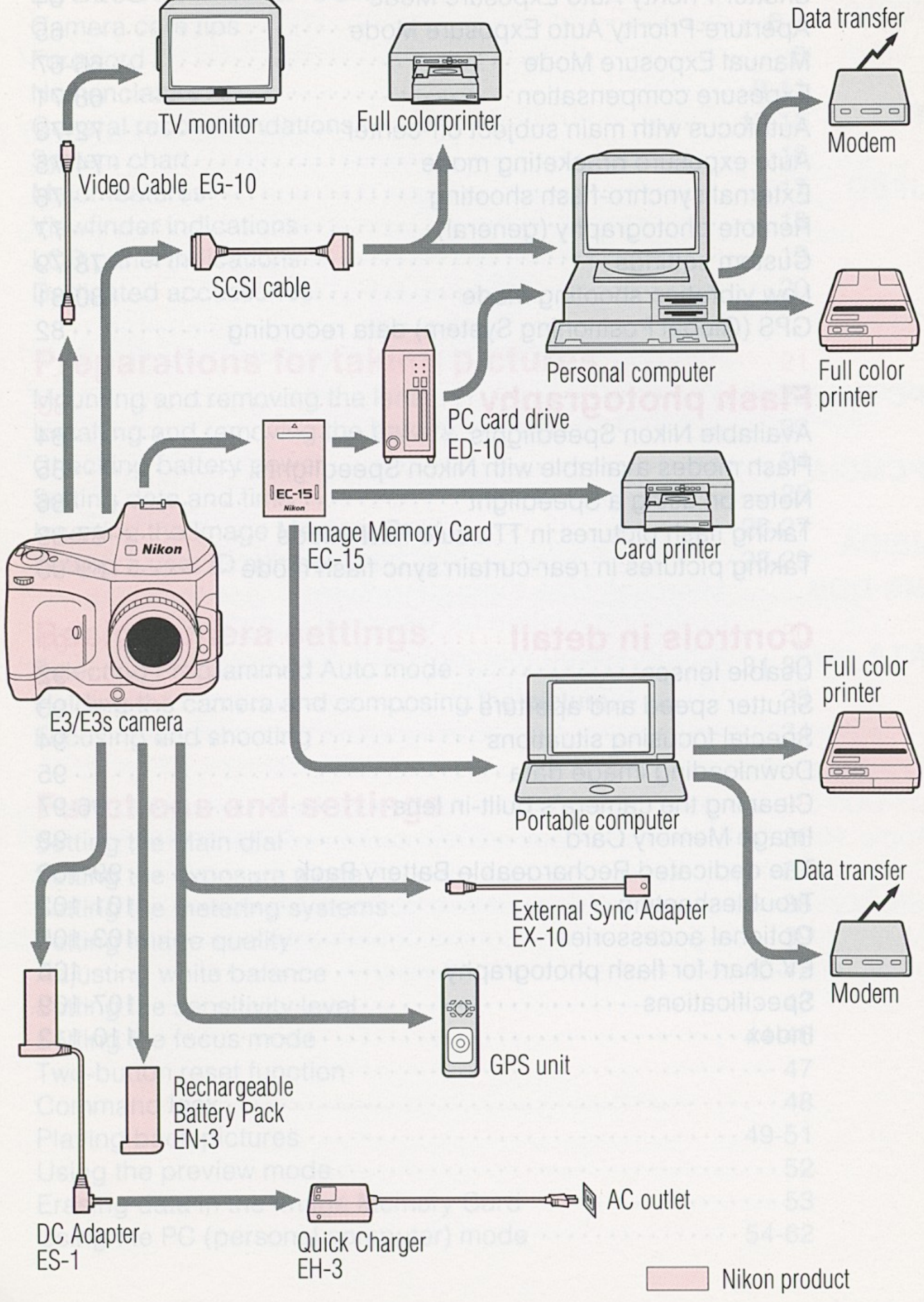
Basic camera settings 30
Selecting Programmed Auto mode 31-32
Holding the camera and composing the picture 33
Focusing and shooting 34

Functions and settings 35
Setting the Main dial 36
Setting the exposure mode 37
Setting the metering systems 38
Setting image quality 39
Adjusting white balance 40-42
Setting the sensitivity level 43
Setting the focus mode 44-46
Two-button reset function 47
Command lock 48
Playing back pictures 49-51
Using the preview mode 52
Erasing data in the Image Memory Card 53
Using the PC (personal computer) mode 54-62

Aperture-Priority Auto Exposure Mode 65
Manual Exposure Mode 66-67
Exposure compensation 68-71
Autofocus with main subject off-center 72-73
Auto exposure bracketing mode 74-75
External synchro-flash shooting 76
Remote photography (general) 77
Custom settings 78-79
Low vibration shooting mode 80-81
GPS (Global Positioning System) data recording 82

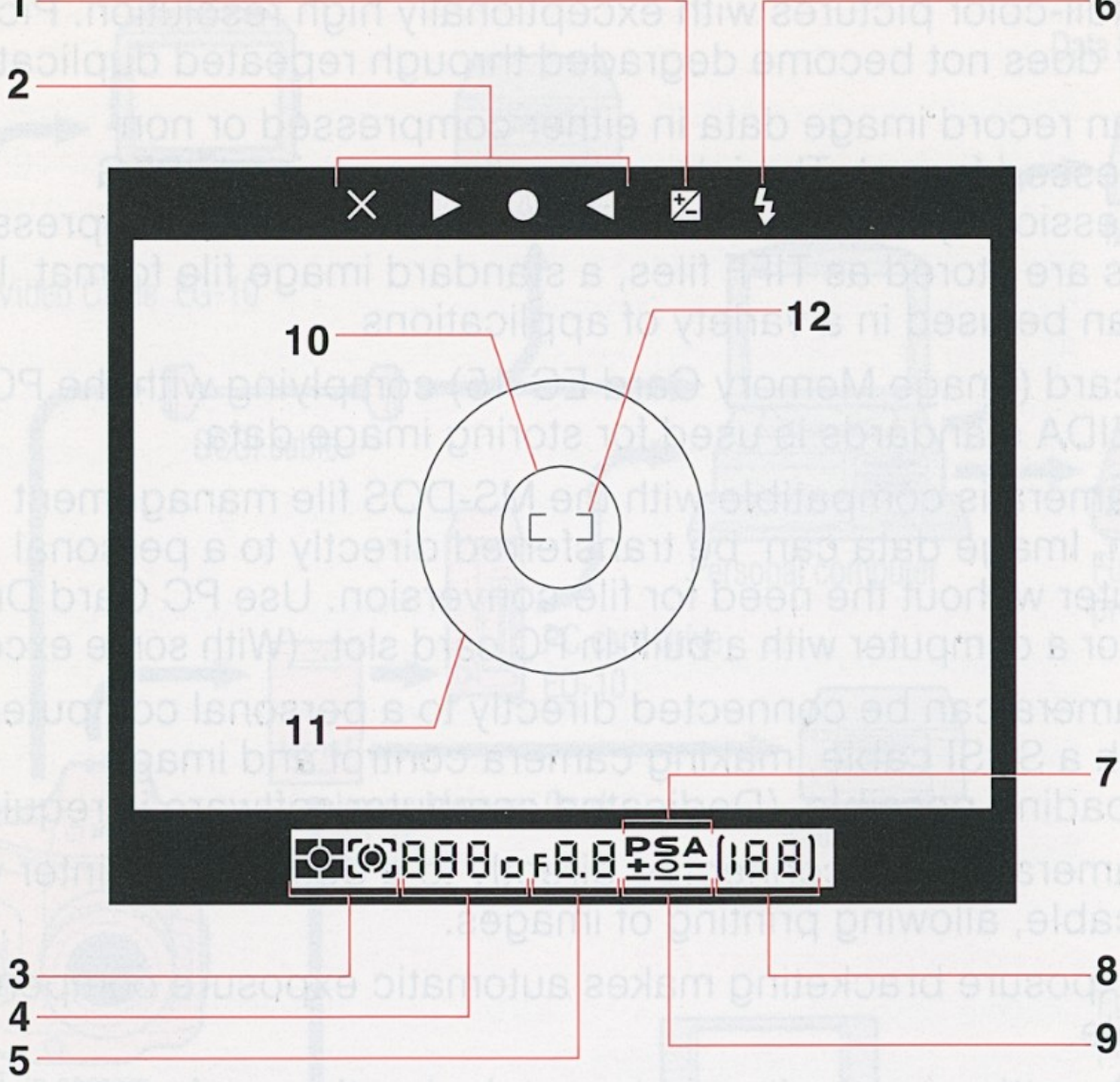
Flash photography 83
Available Nikon Speedlights 84
Flash modes available with Nikon Speedlights 85
Notes on using a Speedlight 86
Taking flash pictures in TTL auto flash mode 87-88
Taking pictures in rear-curtain sync flash mode 89-90

Controls in detail 91
Usable lenses 92
Shutter speed and aperture 93
Special focusing situations 94
Downloading image data 95
Cleaning the camera's built-in lens 96-97
Image Memory Card 98
The dedicated Rechargeable Battery Pack 99-100
Troubleshooting 101-102
Optional accessories 103-105
EV chart for flash photography 106
Specifications 107-109
Index 110-113


Data transfer
TV monitor
Full colorprinter
Modem
Video Cable EG-10
SCSI cable
Personal computer
Full color printer
PC card drive ED-10
EC-15
Nikon
Image Memory Card EC-15
Card printer
Nikon
E3/E3s camera
Full color printer
Portable computer
Data transfer
External Sync Adapter EX-10
Modem
GPS unit
Rechargeable Battery Pack EN-3
DC Adapter ES-1
Quick Charger EH-3
AC outlet
Nikon product

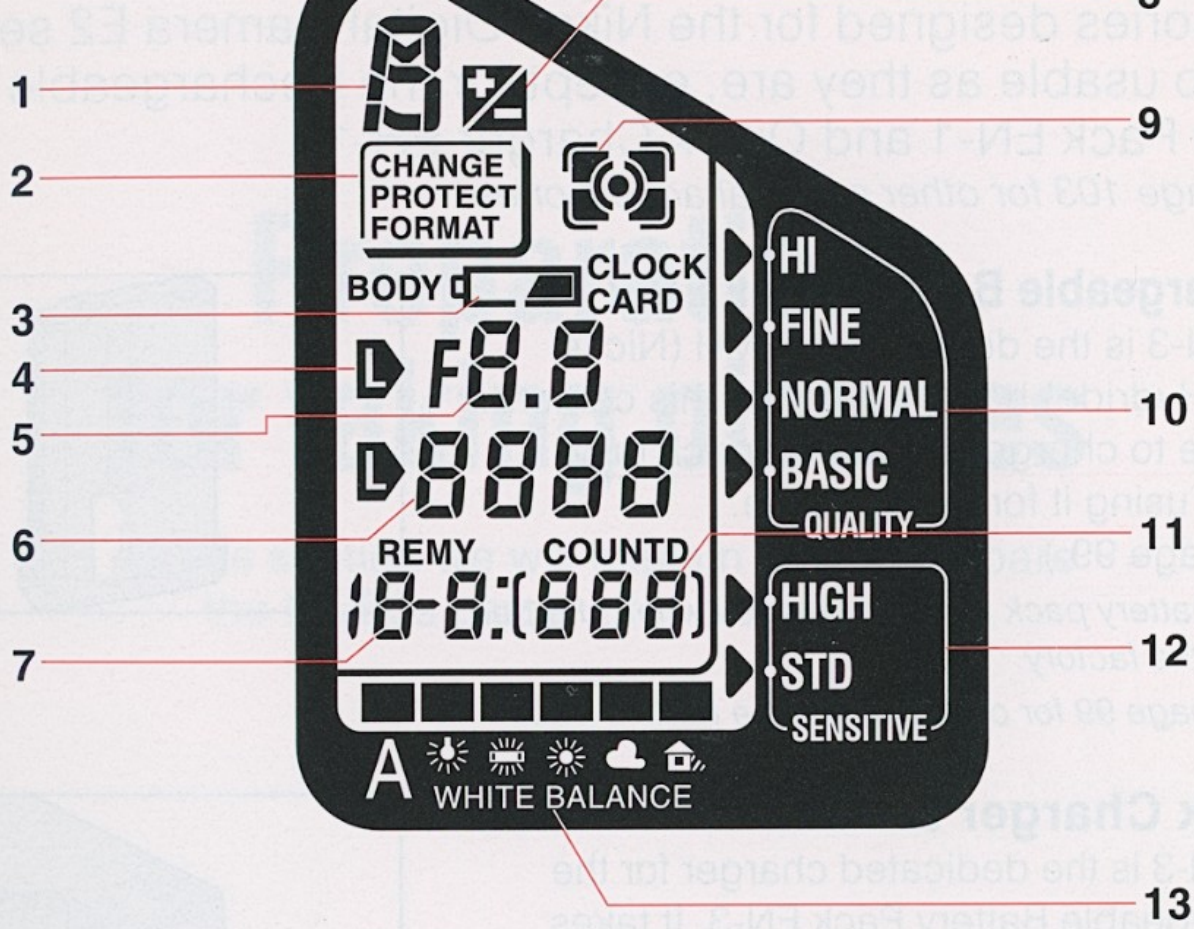
crisp, full-color pictures with exceptionally high resolution. Picture quality does not become degraded through repeated duplication.

- You can record image data in either compressed or non-compressed format. The internationally recognized JPEG compression system is in use with this camera. Non-compressed images are stored as TIFF files, a standard image file format. Image files can be used in a variety of applications.
- A PC card (Image Memory Card EC-15) complying with the PCMCIA and JEIDA standards is used for storing image data.
- This camera is compatible with the MS-DOS file management system. Image data can be transferred directly to a personal computer without the need for file conversion. Use PC Card Drive ED-10 or a computer with a built-in PC card slot. (With some exceptions)
- The camera can be connected directly to a personal computer through a SCSI cable, making camera control and image downloading possible. (Dedicated computer software is required.)
- The camera can be connected directly to a dedicated printer via an SCSI cable, allowing printing of images.
- Auto exposure bracketing makes automatic exposure compensation possible.
- Custom settings make it easy to match shooting preferences.
- Shooting data can be displayed on a TV monitor and printed out.
- High performance, high precision photography is possible due to Nikon camera-based AF and AE control systems.
- Most F-mount AF Nikkor and AI-type Nikkor lenses for Nikon 35mm SLR cameras can be used without any modification.
  Note: Please refer to the chart for a complete list of usable lenses. (See page 92, and the separate lens compatibility chart.)
- The camera comes with a video output terminal (NTSC and PAL) that allows you to playback exposed images on an external TV monitor.
- A new, high-precision aperture control unit is built into the camera to increase exposure accuracy. (You cannot set the aperture by turning the lens aperture ring.)



1 Exposure compensation
2 Focus indicators
3 Metering system
4 Automatically selected shutter speed (in P and A mode)
Manually selected shutter speed (in S and M mode)
5 Automatically selected aperture (in P and S mode)
Manually selected aperture (in A and M mode)
6 Flash-ready light
7 Exposure modes
P (Programmed auto mode)
S (Shutter-priority auto mode)
A (Aperture-priority auto mode)
8 Frame counter
9 Exposure indicators (in M mode)
10 5mm-dia. reference circle for spot metering
11 12mm-dia. reference circle for center-weighted metering
12 Focus brackets

A complete set of viewfinder indications are shown in the above illustration for purposes of reference only. All these viewfinder indications would never appear at one time in normal operation.



1 Exposure mode
2 Image Memory Card
3 Battery
4 Lock indicator
5 Aperture
6 Shutter speed
7 Frames-remaining counter
8 Exposure compensation
9 Metering system
10 Image quality
11 Frames-shot counter
12 Sensitivity
13 White balance mode

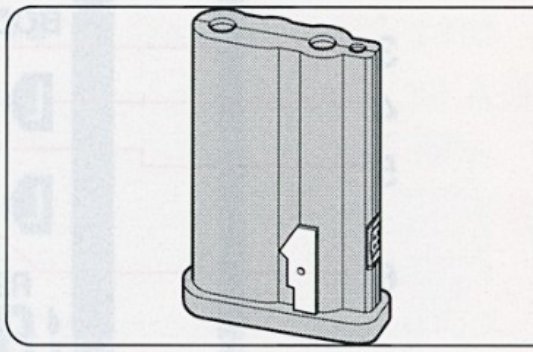
A complete set of indications are shown on the above LCD panel for purposes of reference only. All these indications would never appear at one time in normal operation.

- LCDs are temperature sensitive, and may turn black at high temperatures. They clear up when the temperature drops back to normal.
- In cold temperatures, LCDs may take longer to change the display mode. This is typical of LCDs and not a problem.
- It is common for an LCD to diminish in contrast after approximately 6 to 7 years. When the LCD in your E3/E3s exhibits reduced contrast, the LCD can be replaced by the Nikon Service Center for a fee.
- See pages 101-102 for details on LCD panel indications.

accessories designed for the Nikon Digital Camera E2 series are also usable as they are, except for the Rechargeable Battery Pack EN-1 and Quick Charger EH-1.

—See page 103 for other optional accessories.

Rechargeable Battery Pack EN-3

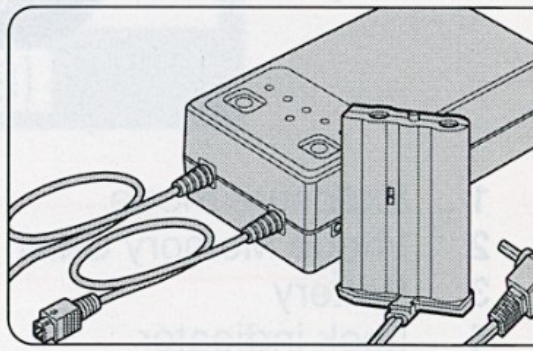


The EN-3 is the dedicated Ni-MH (Nickel Metal Hydride) battery pack for this camera. Be sure to charge the battery pack fully before using it for the first time.
(See page 99.)

—The battery pack was not charged when shipped from the factory.

—See page 99 for details about the battery pack.

Quick Charger EH-3

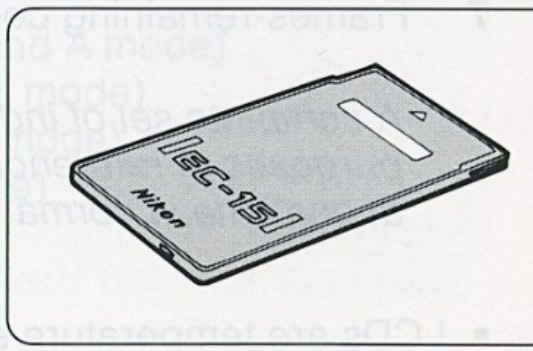


The EH-3 is the dedicated charger for the Rechargeable Battery Pack EN-3. It takes approx. 60 minutes to recharge fully the EN-3 (at room temperature).

—DC Adapter ES-1 is provided.

—For more details, refer to the instruction manual provided with the Quick Charger EH-3.

Nikon Image Memory Card EC-15 (15MB)



The EC-15 Image Memory Card is a dedicated ATA PC card for this camera complying with PCMCIA Rel. 2.1 and JEIDA Ver. 4.2 standards. Be sure to initialize the card before using it for the first time.
(See page 27.)

—See page 98 for details on the Image Memory Card.

Preparations for taking pictures

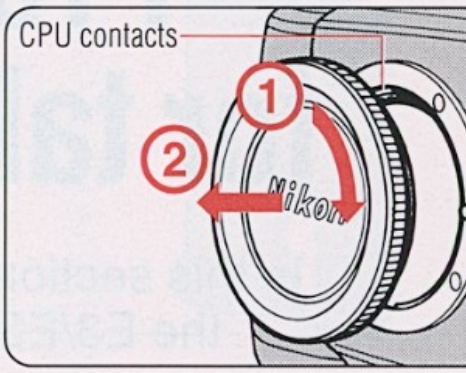
In this section we will explain how to prepare the E3/E3s camera for picture-taking.

—*Be sure to set the Main dial to L (power off). (See page 36.)*

—*Be careful not to touch, smear or damage the CPU contacts as this may cause the camera to malfunction. If this occurs, clean the contacts with soft, clean, dry cloth.*

1 Removing the body cap

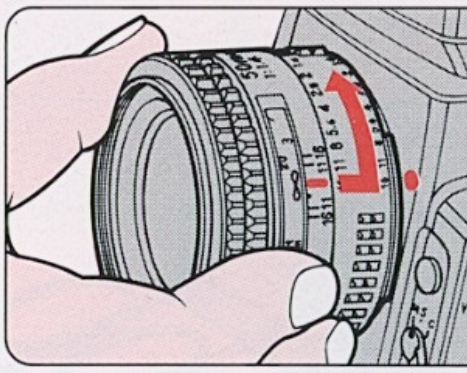
Rotate the body cap clockwise to remove.



2 Mounting the lens

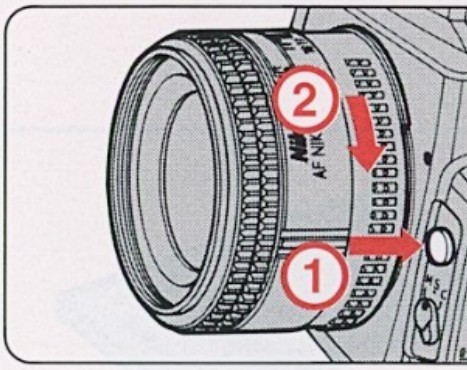
Mount the lens by aligning the distance/aperture index line on the lens with the lens mounting index on the camera. Rotate the lens counterclockwise until it locks into place.

—*Do not press the lens release button when mounting the lens.*



3 Removing the lens

Depress and hold the lens release button; securely grip the lens and rotate it clockwise, in the direction of the arrow.



When leaving the camera without a lens

Attach the body cap to the camera body; align the indexes on both the ca and the body, and rotate the cap counterclockwise as far as it will go.

If the lens release button remains stuck in the pressed positio

Make sure you rotate the lens until the lens release button returns back to the normal position with a click.

was not charged when shipped from the factory. You must charge the battery fully before installing it for the first time. (See page 99.)

—Never touch the battery pack's metal port with another metal object.

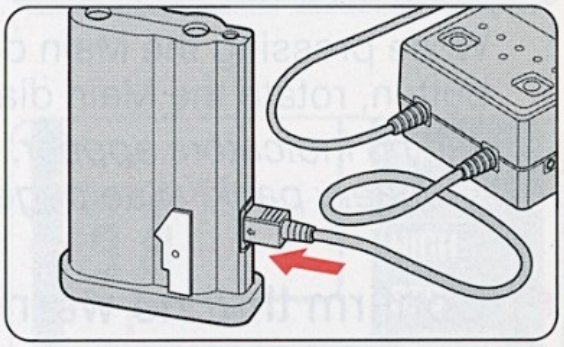
—Be sure to set the Main dial to L (power off) when installing and removing the battery pack.

—See page 99 for handling batteries.

1 Fully recharging the battery pack

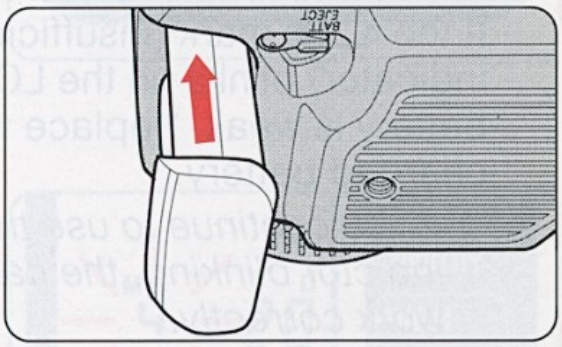
Use dedicated Quick Charger EH-3. A full recharge takes approx. 60 minutes.

—Refer to the instruction manual attached to the EH-3 for recharging.



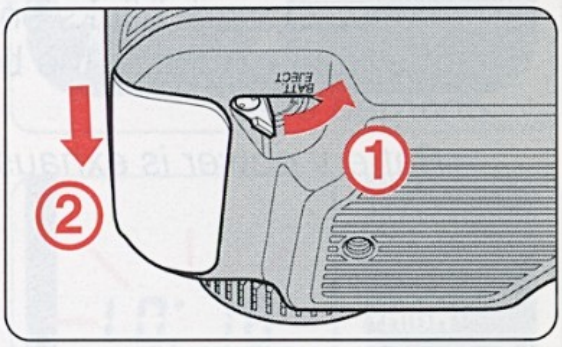
2 Installing the battery pack

Install the fully charged battery pack (EN-3) into the battery chamber at the bottom of the camera and push it down until it locks into place.



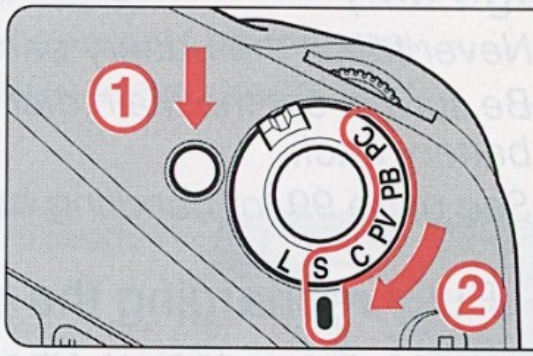
3 Removing the battery pack

Turn the battery eject lever in the direction of the arrow; the battery pack then pops out and can be removed.



accidental failure.

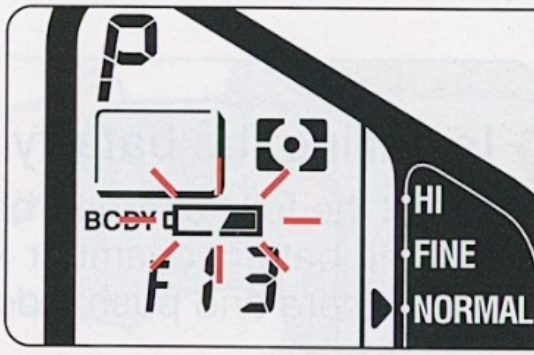
1 Set the Main dial to any position other than L (power on). Confirm that the indicators appear on the LCD panel and inside the viewfinder .



While pressing the Main dial lock-release button, rotate the Main dial.

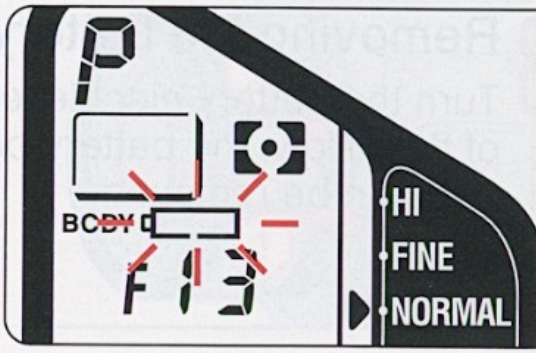
—If no indicators appear, reinstall the battery pack. (See page 23.)

2 Confirm that no warning indicator appears.



If the mark (insufficient battery power indicator) blinks on the LCD panel, the battery is weak. Replace with a fully charged battery.

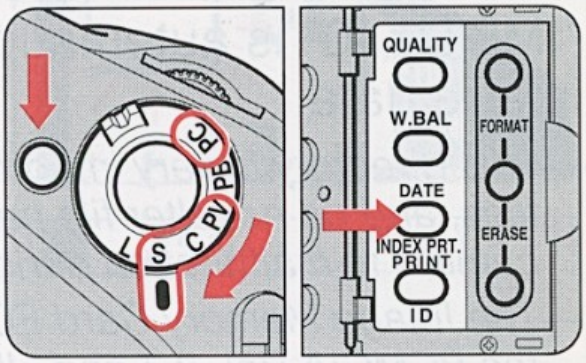
—If you continue to use the camera with the indictor blinking, the camera may not work correctly.



If the mark blinks on the LCD panel, immediately replace the battery with a fully charged one.

—Battery power is exhausted.

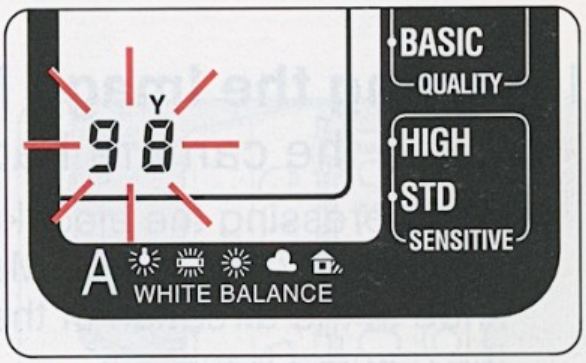
Set the Main dial to either S, C, PV, or PC (Pr). The display on the LCD panel changes in the following order: Year, Month/Day, and Hour/Minute, as you push the DATE button.



Setting date and time

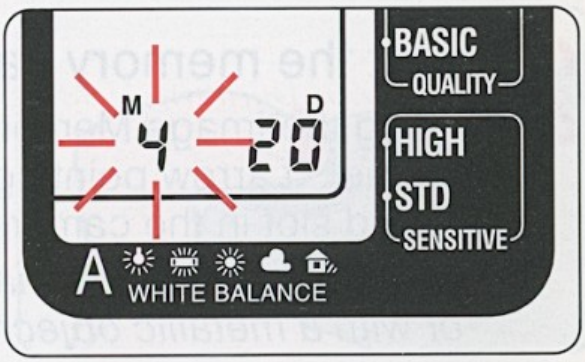
1 Setting the "year"

Set the Main dial to either S, C, PV, or PC (Pr). Press the shutter release button halfway, then press the DATE button for approx. 1 second or more, so that the "year" section starts to blink. Rotate the command dial to set the correct "year". Then press the DATE button until the "month" section starts to blink.



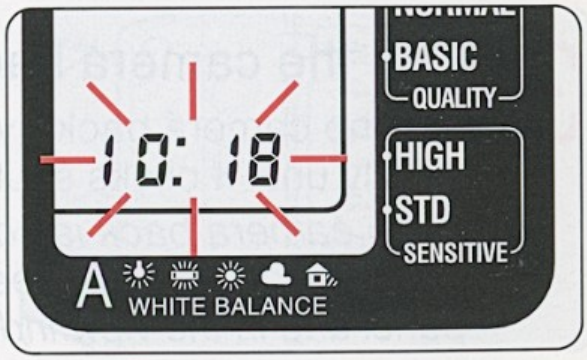
2 Setting the "month" and "day"

Rotate the command dial to set the correct "month." Then press the DATE button so that the "day" section starts to blink. Set the "day" in the same manner. Next press the DATE button so that the "hour" section starts to blink.



3 Setting the "hour" and "minute"

Rotate the command dial to set the correct "hour" and press the DATE button. Set the "minute" in the same manner. Finally press the DATE button to return to the normal display.



—*The seconds are reset to zero as soon as the "minute" is set.*

—*If the shutter is released while the date/time setting is in progress, or the camera is left untouched in the date/time setting mode for more than 90 seconds, the date/time setting mode will be canceled, and all previously set data will remain unchanged.*

"IMFIDX10" is automatically created on the card for storing image data.

—*This directory is very important for managing files. Do not delete directory o files, and do not alter file names from the computer. This may cause the camera to malfunction during shooting and playback operations.*

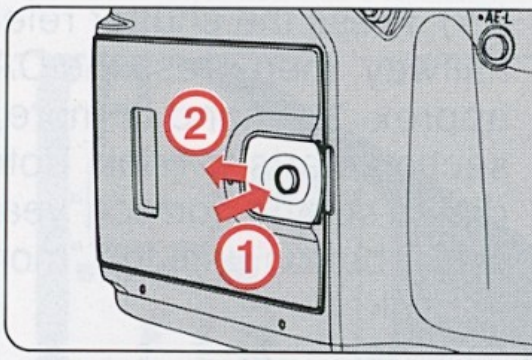
—*The Image Memory Card EC-15 is an ATA PC card and is in compliance wit the PCMCIA Rel. 2.1 and JEIDA Ver. 4.2 standards.*

—*See page 98 for details on the Image Memory Card.*

Inserting the Image Memory Card

1 Open the camera back.

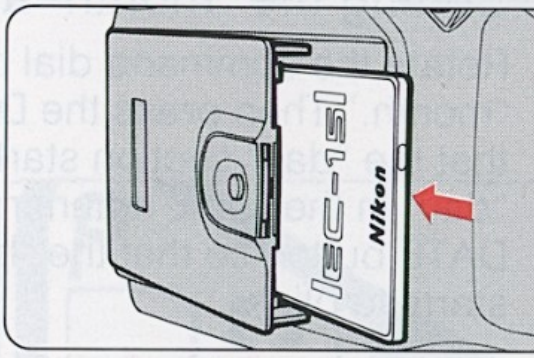
While pressing the eject knob lock-release button, slide the Image Memory Card eject knob in the direction of the arrow to open the camera back.



2 Insert the memory card.

Holding the Image Memory Card face up (with the ◁ arrow pointing left), insert it into the card slot in the camera back.

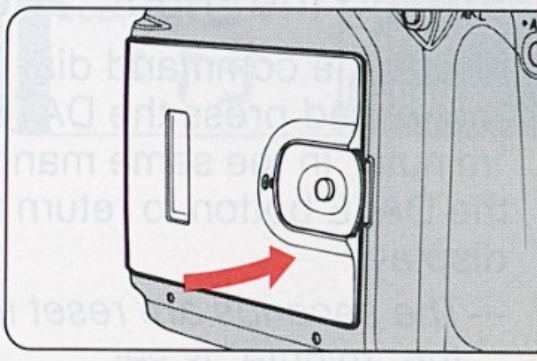
—*Never touch the terminals with your finger or with a metallic object.*



3 Close the camera back.

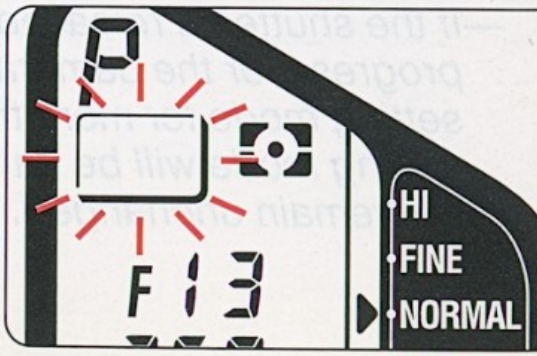
Close the camera back by pushing it down carefully until it clicks shut.

—*If the camera back is not shut properly, a warning indicator appears on the LCD panel and in the viewfinder. (See page 101.)*



4 LCD confirmation.

The Image Memory Card indicator appears on the LCD panel.

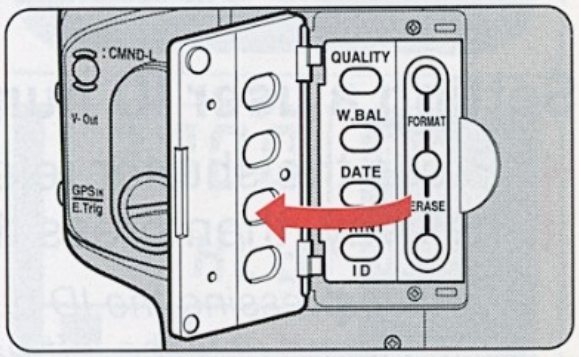


and in the viewfinder blinks as a warning. You should then insert an Image Memory Card.

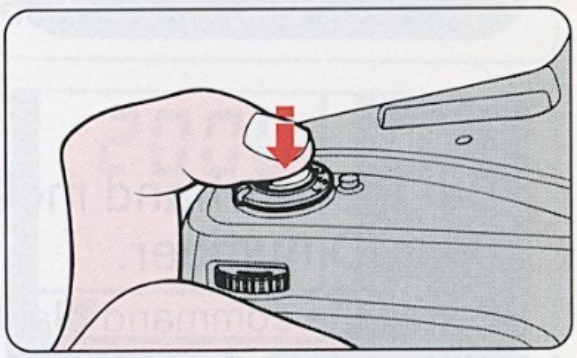
- **To confirm that an Image Memory Card is inserted, look at the Image Memory Card confirmation window.**
- **Be aware that the camera will function even with no Image Memory Card inserted.**

Initializing (formatting) the card

1 Open the cover on the camera side.



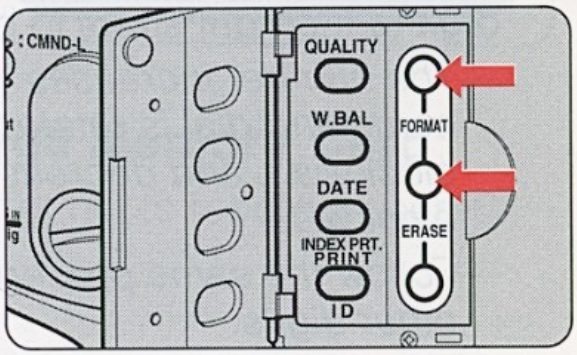
2 Press the shutter release button halfway.



3 Press the FORMAT buttons simultaneously for at least one second to start initializing the Image Memory Card.

—*When the initialization is complete, the frame counter advances to "1".*

—*Initializing time depends on the type and capacity of the memory card.*



●CAUTION

Any data in the memory card will be deleted during initialization.

- This data will not be recoverable. Save and backup valuable data before initializing the card.
- Take special care when initializing a memory card other than for the first time.

photographer, you can tell who took the pictures by viewing the number on the playback screen.

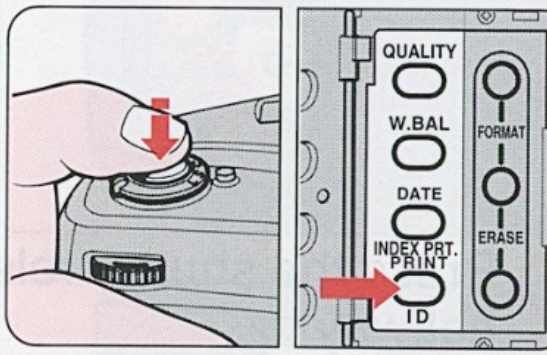
Reviewing the user ID number previously set

Open the cover on the side of the camera body and press the ID number button. The currently set user ID number will appear on the LCD panel.

Setting a user ID number

1 Press the shutter release button halfway, then press the ID button.

—Keep pressing the ID button for approx. 1 second until the left-hand most digit starts to blink in the user ID number.



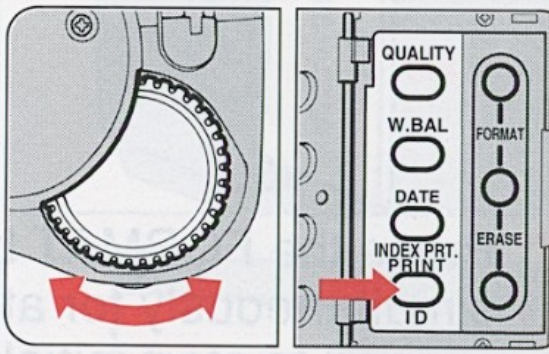
2 Set the left-hand most digit of the user ID number.

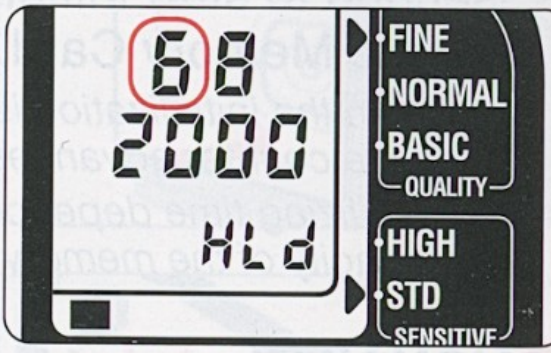
Rotate the command dial to set the digit (0 to 9), then press the ID button. Then the digit to the right starts to blink.

—The number increases when the command dial is rotated counter-clockwise, and decreases when rotated clockwise.

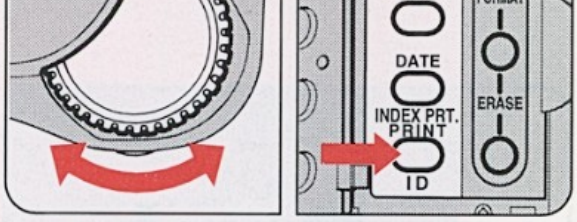
—Follow the same procedure to set the other digits.

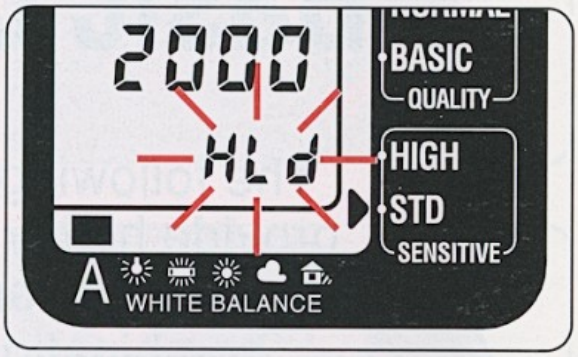
—If the shutter release button is pressed halfway while setting a user ID number, or the camera is left untouched for more than 90 seconds in this mode, the setting will be canceled, and all previously set data will remain unchanged.



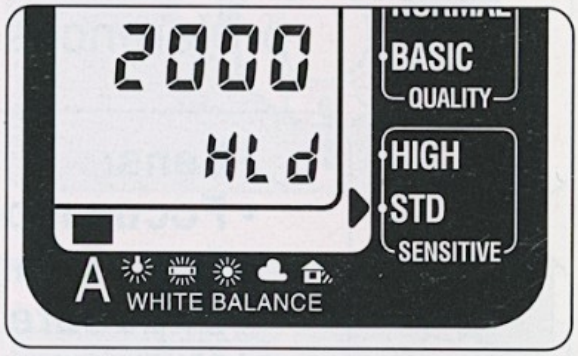


After setting 6 digits of the user ID number, a "Hld" or "Inc" indicator blinks on the LCD panel. Rotate the command dial to choose either "Hld" or "Inc". Finally press the ID button.

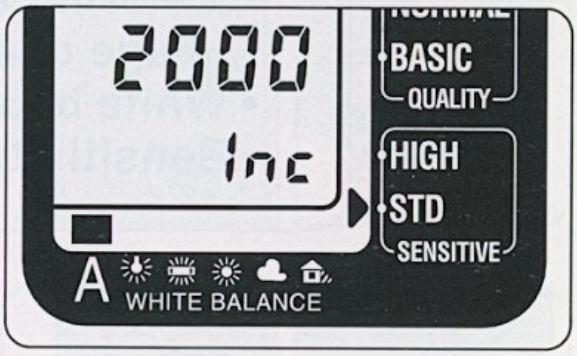




—*When the mode is set to "Hld", the user ID number remains unchanged.*
(Holding mode)



—*When the mode is set to "Inc", the user ID number increases by "1" for each image frame.*
(Increasing mode)



Recording a user ID number on the Image Memory Card

Use the custom settings function to choose whether or not to record a user ID number on the Image Memory Card. (See page 78.)

Basic camera settings

The following lens type and settings selection provide highly automatic, convenient operation. You may use any usable Nikkor lens or make any combination of settings according to your preferences or picture taking requirements.

• **Lens:**	**AF Nikkor lens**
• **Focus mode:**	**S** (Single servo autofocus)
• **Frame advance mode:**	**S** (Single frame shooting)
• **Exposure mode:**	**P** (Programmed auto)
• **Metering system:**	**Matrix metering**
• **Image quality:**	**NORMAL**
• **White balance:**	**A** (Auto)
• **Sensitivity:**	**STD** (Standard)

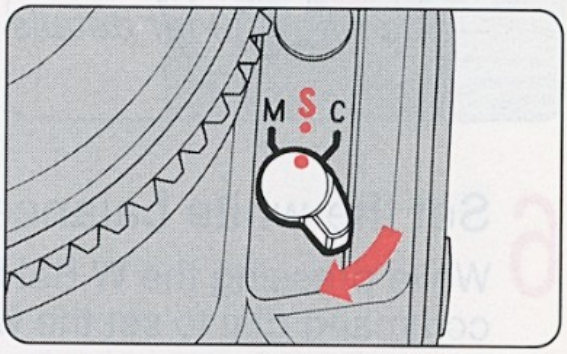
To automatically and quickly reset the camera to the preceding settings, press the MODE button and SENS button simultaneously. (See page 47.)

simplest method for exposure control. Use this mode for most general photographic situations.

1 Set the focus mode to S.

Rotate the focus mode selector to S (Single Servo Autofocus).

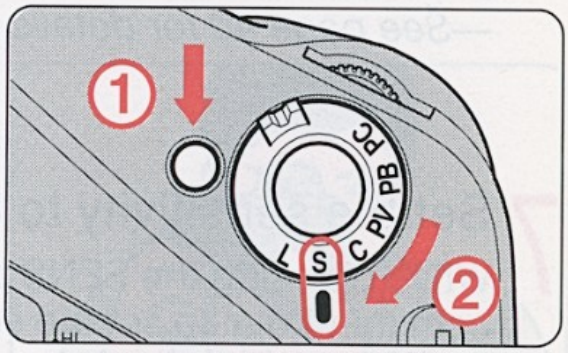
—*See page 44 for details on focus modes.*



2 Set the Main dial to S.

While pressing the Main dial lock-release button, rotate the Main dial to S (Single-frame shooting).

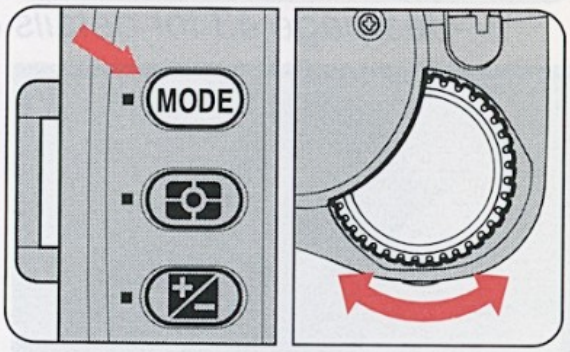
—*See page 36 for details on the frame advance mode.*



3 Set the exposure mode to P.

While pressing the MODE button, rotate the command dial to set the exposure mode to P (Programmed Auto) mode.

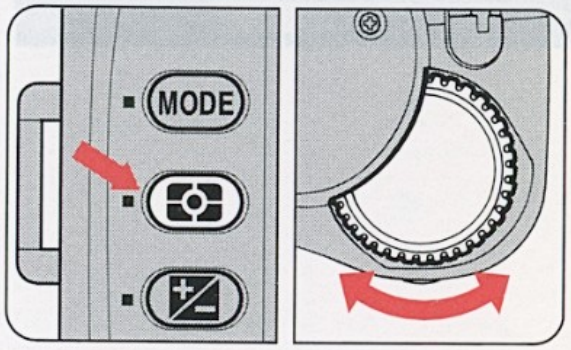
—*See page 37 for details on the exposure mode.*



4 Set the metering system to ⊡.

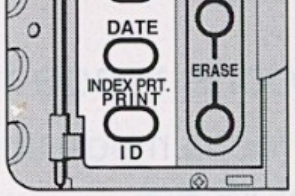
While pressing the metering system button, rotate the command dial to set the metering system to Matrix Metering ⊡.

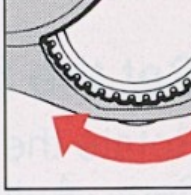
—*See page 38 for details on metering systems.*



NORMAL.

—See page 39 for details on image quality.

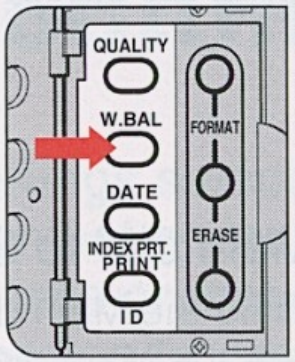


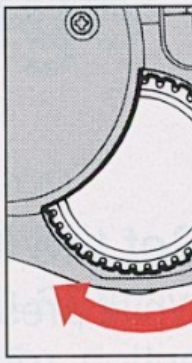


6 Set the white balance to A.

While pressing the W.Bal button, rotate the command dial to set the white balance to A (auto)

—See page 40 for details on white balance.

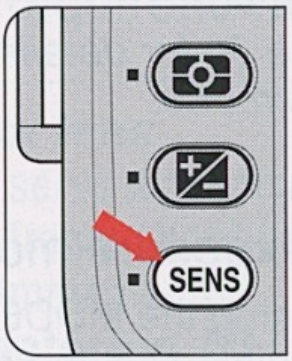


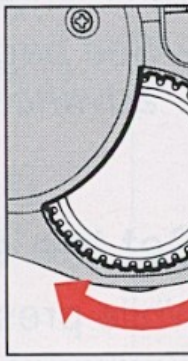


7 Set the sensitivity to STD.

While pressing the SENS button, rotate the command dial to set the sensitivity to STD (standard).

—See page 43 for details on sensitivity.

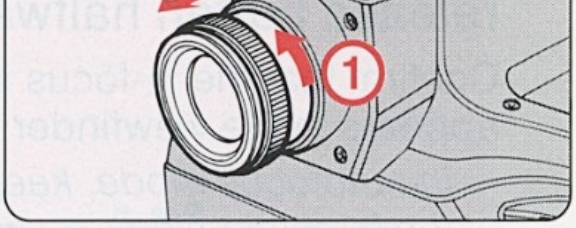




adjusting the eyepoint. Eyeglass wearers will benefit from pushing in the eyepiece, while others can pull the eyepiece out for better viewing.

To pull the eyepiece out, rotate the eyepiece ring counterclockwise until it comes off the thread, and pull it out until it stops. Then rotate the eyepiece ring counterclockwise to secure it.

—To push the eyepiece in, repeat the same operation in reverse.



2 Hold the camera and look through the viewfinder.

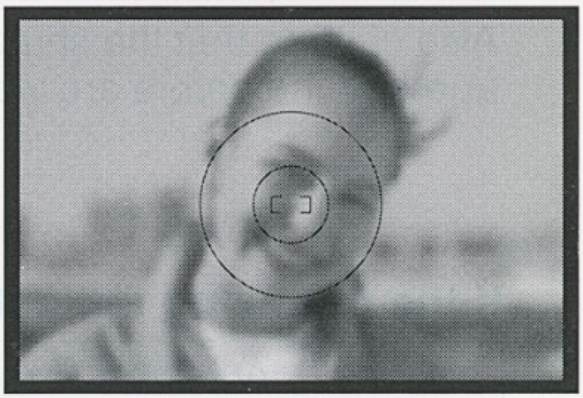
Hold the camera steady to avoid camera shake or incorrect focusing.

—In autofocus mode, keep your hands off the lens focusing ring when shooting.

3 Compose the picture.

Position the focus bracket on the main subject and compose.

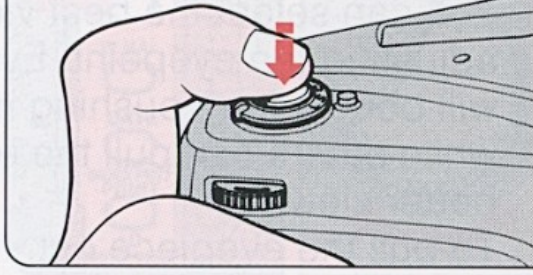
—If the main subject is off-center, use the AF-L button. (See page 72.)



1 other than L, and press the shutter release button halfway.

Confirm that the in-focus indicator ● appears in the viewfinder.

—In autofocus mode, keep your hands off the lens focusing ring when shooting.



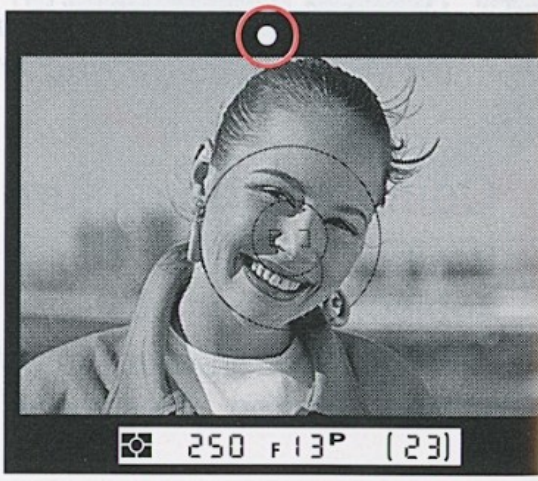
● NOTE

Shutter release operation

- Press the shutter release button lightly to turn the camera on; indicators appear on the LCD panel and inside the viewfinder.
- A power-hold timer allows the indicator illumination to last for 16 seconds after you remove your finger from the shutter release button.
- Fully depress the shutter release button to take pictures.
- The duration of power-hold timer can be modified in the custom setting mode. (See page 78.)

2 Confirm that the in-focus indicator ● appears and release the shutter to take a picture.

Also confirm that the shutter speed and aperture indicators are visible.

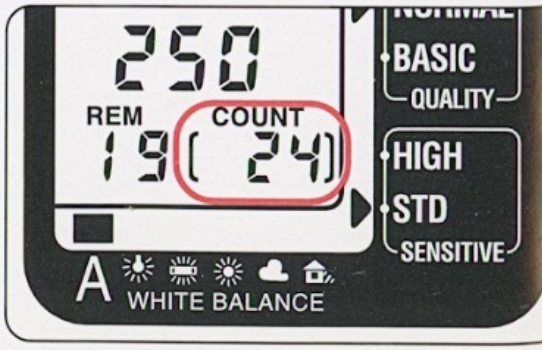


If the following indications appear:

×	Autofocus is not possible. (See page 94.)
▶	The subject is out of focus and the area in front of the subject is in focus. (See page 102.)
◀	The subject is out of focus and the area behind the subject is in focus. (See page 102.)
Hi, Lo	Out of exposure control range (overexposure or underexposure alert) (See page 102.)

3 Check the frame counter.

Each time the shutter is released, the frames-shot counter advances to the next frame number, while the frames-remaining counter counts down by one frame. When the memory card is full, "0" blinks on the LCD panel to alert you, and the shutter locks.



Functions and settings

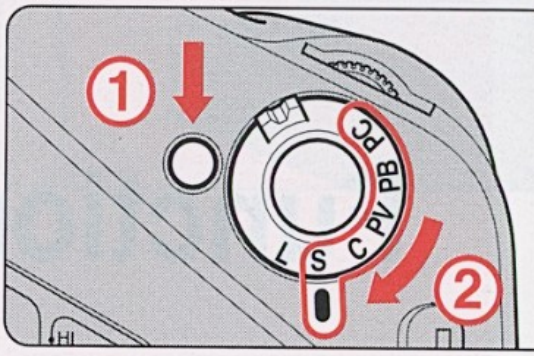
This section explains basic camera functions and how best to utilize them to obtain optimum results in a variety of photographic situations.

When setting the following five modes, rotate the Main dial to either S or C, then rotate the command dial while the camera power-hold timer is activated.

- Exposure mode
- Metering system
- Image quality
- White balance
- Sensitivity

While pressing the Main dial lock-release button, rotate the Main dial to the desired mode.

—Make sure that the Main dial clicks into position.



L: Camera power is off.
Set the Main dial to L when the camera is not in use to preserve battery power and prevent accidental release of the shutter.

S: Single-frame shooting mode
Shooting operation is limited to one frame at a time.

C: Continuous shooting mode
In continuous shooting mode: Shooting operation continues as long as the shutter release button is depressed.

Model	Shooting speed	Max. number of frames
E3	Approx. 1 frame/sec.*1	—
E3s	Approx. 3 frames/ sec.*2	12 frames

*1 A shutter speed faster than 1/250 sec. is selected and image quality is set to BASIC (when using Image Memory Card EC-15).
*2 A shutter speed faster than 1/250 sec. is selected.

PV: Preview mode
The image can be previewed each time you press the shutter release button. (See page 52.)

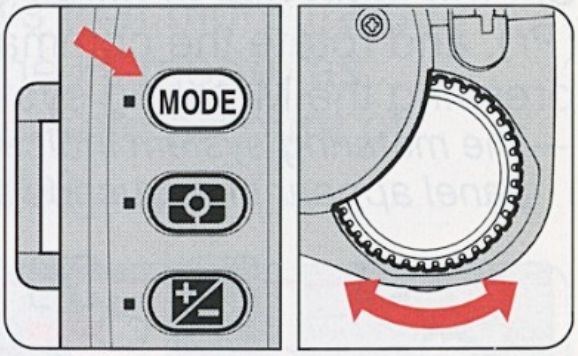
PB: Playback mode
Image data stored in the memory card can be played back on a TV monitor. (See page 49.)

PC: Personal computer mode
An image can be downloaded to a personal computer or printed out on a color printer, which is connected via the SCSI terminal.

—Do not rotate the Main dial while recording image data on an Image Memory Card, printing it out, transferring it to a personal computer, or when using the preview mode.

exposure mode indicator blinks in the viewfinder to alert you.

Set the Main dial to either S, C, PV, or PC (Pr), and rotate the command dial while pressing the MODE (exposure mode) button.
The exposure mode indicators on the LCD panel appear in sequence as shown below.



P — S — A — M

P: Programmed Auto Exposure Mode (See page 30.)
The camera's microcomputer automatically selects a combination of shutter speed and aperture. This mode is recommended for most common shooting situations as well as for users who are new to 35mm SLR photography, and for those situations when there is no time to fine tune exposure settings.

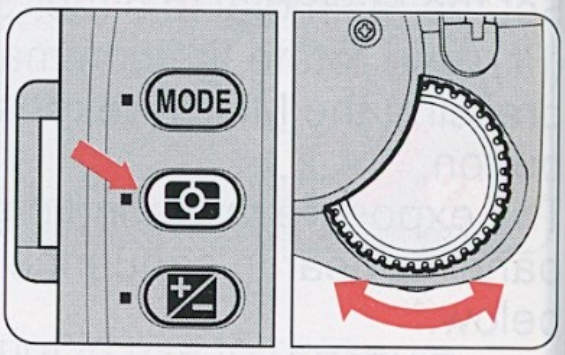
S: Shutter-Priority Auto Exposure Mode (See page 64.)
You set the shutter speed manually using the command dial. The camera automatically selects the proper aperture to match the manually selected shutter speed for correct exposure.

A: Aperture-Priority Auto Exposure Mode (See page 65.)
The camera automatically selects the correct shutter speed to match the aperture you have set. We recommend this mode when depth-of-field is a prime consideration.

M: Manual Exposure Mode (See page 66.)
Both shutter speed and aperture can be set manually to achieve the desired effect. Adjust aperture and/or shutter speed referring to the over/correct/under exposure indicators.

systems—Matrix Metering, Center-Weighted Metering, and Spot Metering.

Set the Main dial to either S, C, PV, or PC (Pr), and rotate the command dial while pressing the Metering system button.
—*The metering system indicators on the LCD panel appear in sequence as shown below.*



: Matrix Metering

Data on scene brightness and contrast are detected by the camera's 5-segment advanced matrix sensor. By analyzing these data, the camera's built-in computer is able to provide correct exposure even in extremely complex lighting situations.

: Center-Weighted Metering

This system concentrates the meter's sensitivity on the 12mm-dia. circle in the viewfinder. This type of metering is useful in situations where you want to base exposure on a specific, centrally located area in the scene.

: Spot Metering

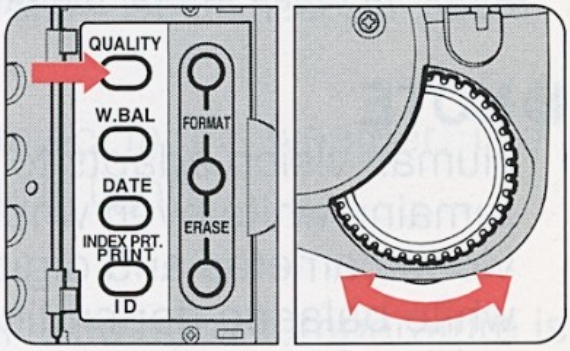
Most of the meter's sensitivity is concentrated in the 5mm-dia. circle in the center of the viewfinder. This meter is effective when precise measurement of a particular portion of the subject is required.

image quality mode are uncompressed images with much detail, while pictures taken at the Basic setting have lower quality due to high compression. It follows that more frames can be shot using the Basic mode than the Hi mode, as uncompressed images take up a considerable amount of memory space (see chart below for details).

Set the Main dial to either S, C, PV or PC (Pr), and rotate the command dial while pressing the QUALITY button.

—*The ▶ arrow on the LCD panel points to one of the following settings.*

BASIC — NORMAL — FINE — HI



Refer to the table below for mode specifications and the corresponding number of frames with the EC-15 (15MB) inserted.

Image quality mode	Image compression factor	Data size per frame	Min. number of frames
HI	Non compression	Approx. 2.45MB	5
FINE	1/4 (4 bit/pixel)	Approx. 640KB	21
NORMAL	1/8 (2 bit/pixel)	Approx. 320KB	43
BASIC	1/16 (1 bit/pixel)	Approx. 160KB	84

—*Select HI mode when image quality is a priority.*

—*Select BASIC mode when the number of frames is a priority.*

camera. For most scenes, select the auto white balance mode. Choose the manual modes for particular lighting situations. We recommend that you experiment with the various settings until you are fully familiar with them.

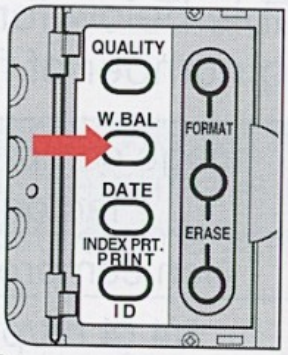
—When using a Speedlight, or in external synchro-flash shooting mode, white balance is adjusted between subject brightness and the light from the flash. The above applies to all white balance modes, with the exception of Flash mode. In Flash mode, white balance is fixed at a preset color temperature.

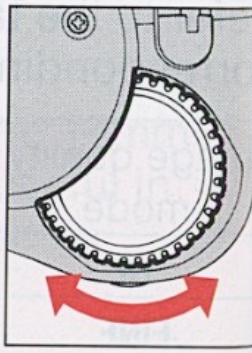
NOTE

Human vision adapts to illumination color so that a white subject remains white even when the illumination color changes. Not so for video cameras and digital cameras. They have to adjust color and white balance depending on background illumination for a white subject to appear white under varying illumination.

Set the Main dial to either S, C, PV or PC (Pr), and rotate the command dial to change the mode while pressing the W.Bal button.

—The ■ mark on the LCD panel settles above one of the following symbols.





—In Flash mode, both ☼ and ☁ light up simultaneously.

A : Auto white balance mode

White balance is adjusted automatically by measuring the color temperature of light passing through the white balance window.

—If insufficient light passes through the white balance window, the color temperature is adjusted at 5100K.

☼ : Incandescent light mode

Suitable for shooting under incandescent light. The color temperature is fixed at 3000K (halogen lamp).

white balance window and makes adjustments for either daylight, white, or cool white fluorescent light.
Color temperature at 6700K (daylight fluorescent light)
Color temperature at 5000K (white fluorescent light)
Color temperature at 4200K (cool white fluorescent light)
—*If insufficient light passes through the white balance window, the color temperature is set at 4200K (white fluorescent light).*

: Fine mode
Suitable for shooting a front-lighted subject in fine weather. The color temperature is set at 5300K (natural light).

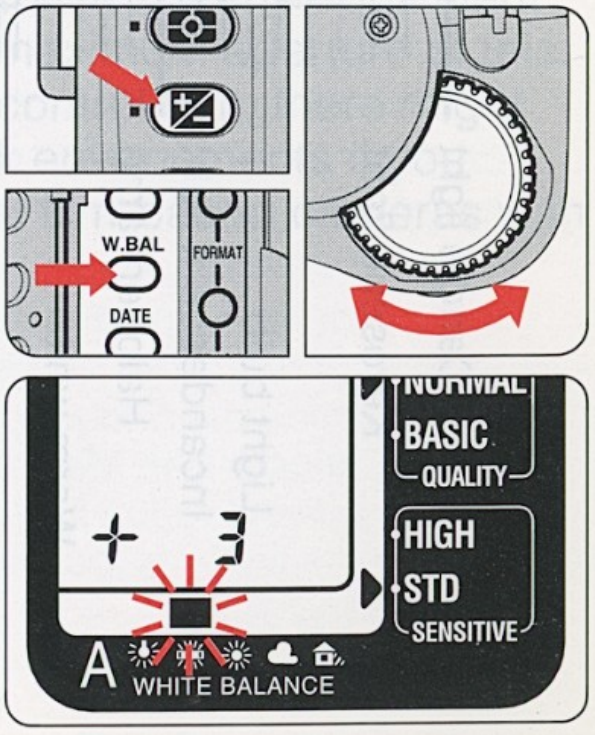
: Cloudy mode
Suitable for shooting in cloudy weather. The color temperature is set at 6500K (natural light).

: Shade mode (fine weather)
Suitable for shooting shaded subjects such as someone standing in the shadow of a building in fine weather. The color temperature is set at 8000K (natural light).

: Flash mode
Best suited for taking pictures in locations where high-power flash units are used such as in studios or other facilities. White balance is fixed at color temperature 5700K.

Setting white balance compensation
You can compensate the white balance within a range of ±3 steps (0/–3/–1/–2/+1/+2/+3) for each mode. While pressing the W.BAL (white balance mode) button and the Exposure Compensation button simultaneously, rotate the command dial to increase or decrease the steps. In this case, the ■ mark on one of the white balance mode indicators blinks.

Set the compensation step to 0 to cancel white balance compensation.



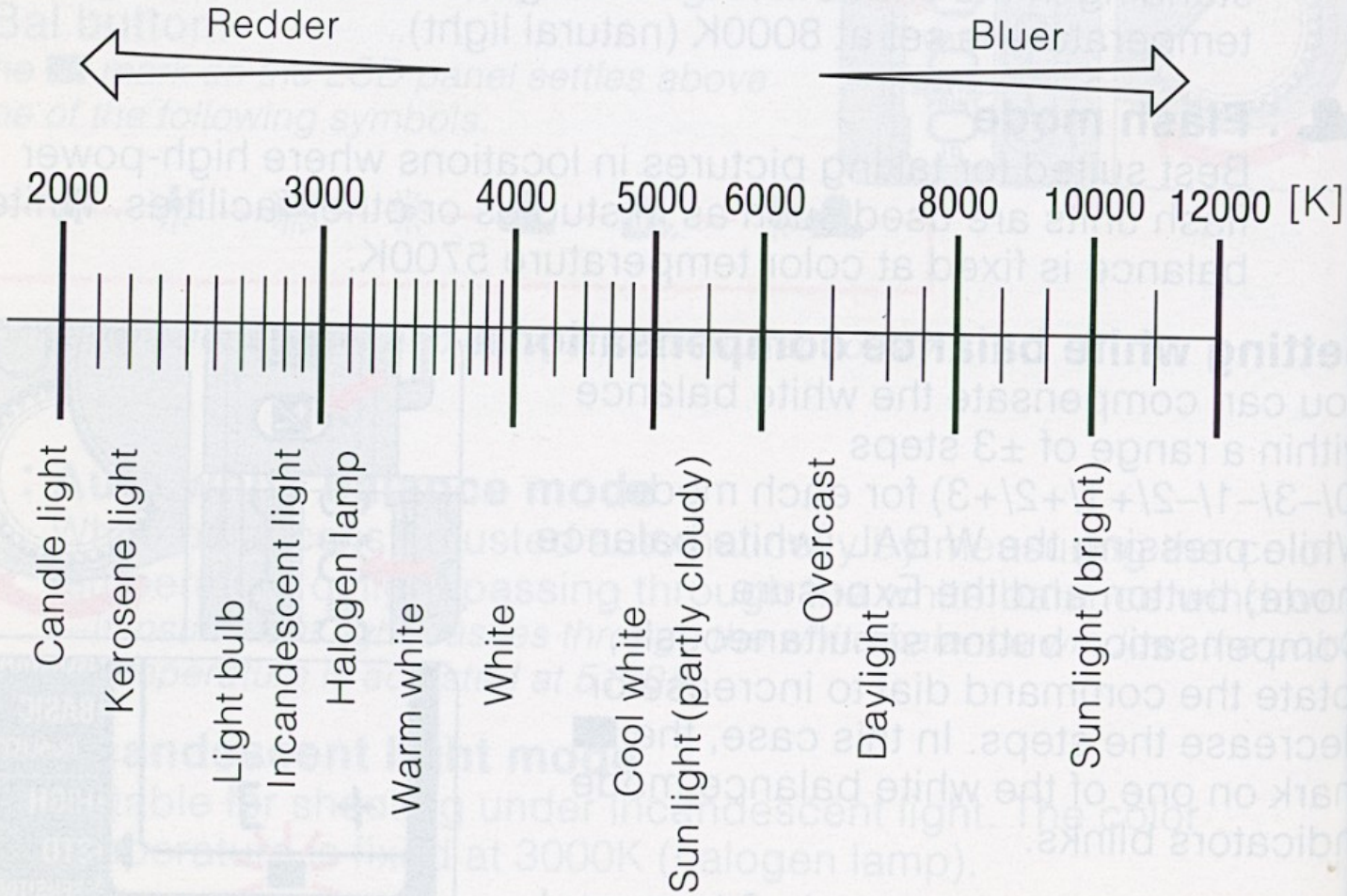
not function.

- Taking pictures where the illumination at the camera and the subject differs, such as taking pictures of an outdoor subject fro inside a room, or shooting a spot-lighted subject on a stage.
- Taking pictures in mixed light sources. For example, taking pictures at a party with fluorescent lights, incandescent lights, et
- Taking pictures under special light sources. For example, sodiu lamps or other special lighting sources.

NOTE

Color temperature

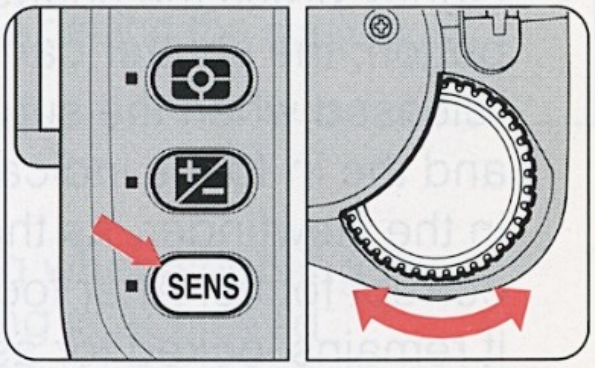
The color temperature of most illumination sources varies in tones ranging from reddish to bluish. These colors are subject to change depending on individual perception. To represent the color of light objectively, we use a color temperature scale expressed in absolut temperature (K). As shown below, the lower the color temperature, the more reddish the light becomes, and the higher the color temperature the more bluish it becomes.



"MID" or "HIGH" for dark interiors.
—*Image quality becomes degraded when the sensitivity level is set to MID or HIGH as compared with STD.*

Set the Main dial to either S or C, and rotate the command dial in either direction to alter the sensitivity while pressing the SENS button.
—*The ▶ arrow on the LCD panel points to one of the following settings.*

STD — MID — HIGH



To set the sensitivity level to "MID," rotate the command dial until the ▶ marks on the LCD panel point to HIGH and STD.

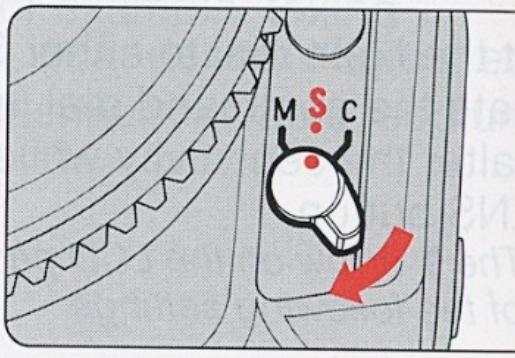
NOTE

Sensitivity and film speed

This camera is designed to take pictures at film speeds equivalent to ISO 800, 1600, and 3200. Because the maximum aperture of this camera is f/4.8 due to its built-in aperture control unit, there might be some restrictions when shooting in dark environments if you compare its performance with conventional film-based cameras with a f/1.4 Nikkor lens mounted.

Manual Focus mode (M) selected by setting the focus mode selector to S, C, or M.

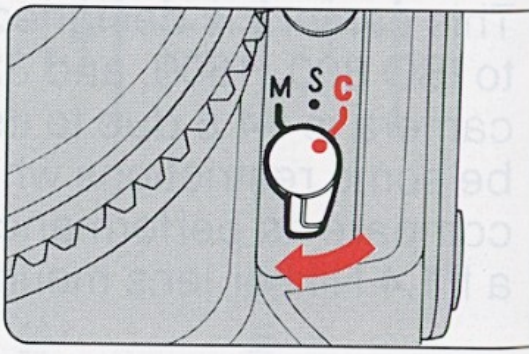
S : Single Servo Autofocus



Lightly press the shutter release button; the shutter can only be released when the subject is in focus and the in-focus indicator ● appears in the viewfinder, as the priority is on correct focus. After focus is achieved, it remains locked for as long as the shutter release button remains lightly pressed. Remove your finger from the shutter release button once and lightly press the button again when you wish to refocus on a different subject.

—If the shutter release button is fully depressed from the start, the lens starts adjusting for focus and the shutter is released as soon as the subject is in focus. With the E3s camera, both focus and exposure are locked.

C : Continuous Servo Autofocus



The shutter can be released anytime, regardless of focus status, since the priority is on shutter release. The camera continues focusing for as long as you keep the shutter release button lightly pressed, even when the in-focus indicator ● appears in the viewfinder.

—To stop focusing, press the AF-L button.

—In Continuous Shooting mode with the E3s camera (the Main dial is set to C), the lens adjusts focus for the first frame only, then the focus is locked when continuous shooting starts.

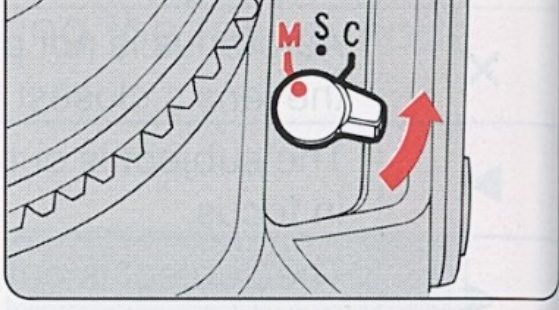
●	The subject is in focus.
×	Autofocus is not possible. The subject is located closer than the lens's closest focusing distance.
▶	The subject is out of focus and the area in front of the subject is in focus.
◀	The subject is out of focus and the area behind the subject is in focus.

CAUTION

Keep your fingers off the lens focusing ring when shooting in autofocus modes (S, C), as correct focusing is achieved automatically.

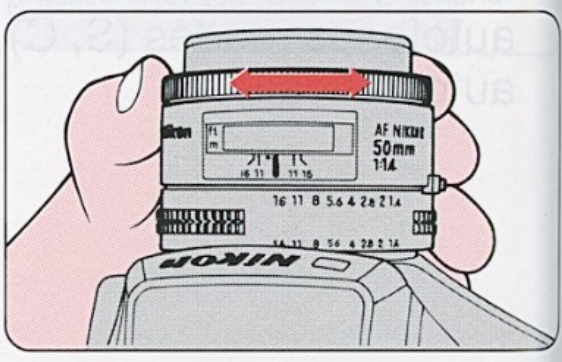
assuring precise manual focus: with the Electronic Rangefinder and with the viewfinder's clear matte field. The shutter release button can be depressed fully anytime.

—When a lens with a maximum aperture of f/5.6 or larger mounted, the manual focus mode is recommended.



- **Manual focus with the viewfinder's clear matte field**

Rotate the lens focusing ring manually to focus on the subject using the clear matte field.

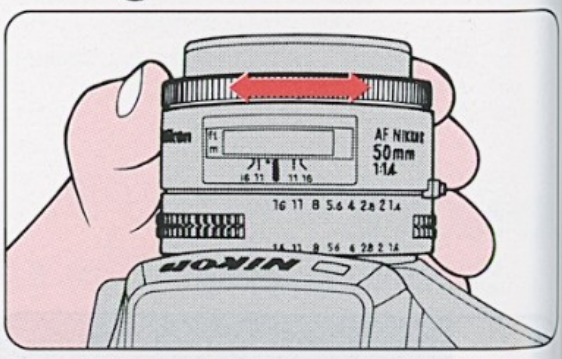


- **Manual focus with the Electronic Rangefinder**

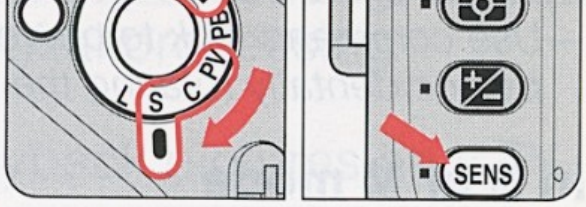
Lightly press the shutter release button and rotate the lens focusing ring manually. The in-focus indicator ● appears in the viewfinder when the subject is in focus.

—*Manually rotate the lens focusing ring in the direction indicated ▶ ◀ until the in-focus indicator appears.*

—*When the focus indicators ▶ and ● or ● and ◀ blink alternately, simultaneously or singly, the subject is almost in focus.*



simultaneously for at least 2 seconds; the camera settings are automatically reset for basic shooting as shown below:



Exposure mode	: **P** (Programmed Auto)	See page 37.
Metering system	: Matrix	See page 38.
Image quality	: **NORMAL** (Normal)	See page 39.
White balance	: **A** (Auto)	See page 40.
Sensitivity	: **STD** (Standard)	See page 43.
Exposure compensation	: 0.0	See page 70.
Custom settings	: (Factory setting)	See page 78.
Auto exposure bracketing setting	: (cancel)	See page 74.

—Command lock (see page 48) is canceled.

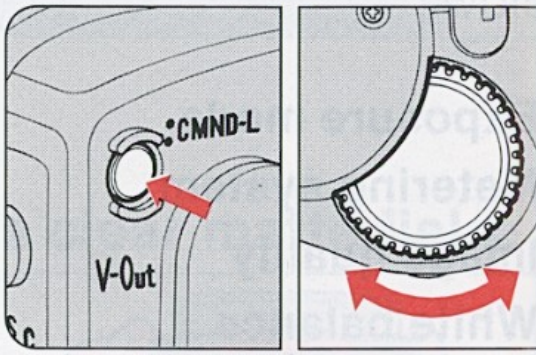
aperture value.

—Use command lock to prevent changes in shutter speed or aperture caused by accidentally rotating the dial during shooting.

In S or M mode

While pressing the CMND-L button, rotate the command dial in either direction, and the shutter speed will be locked with an L appearing next to the shutter speed on the LCD panel.

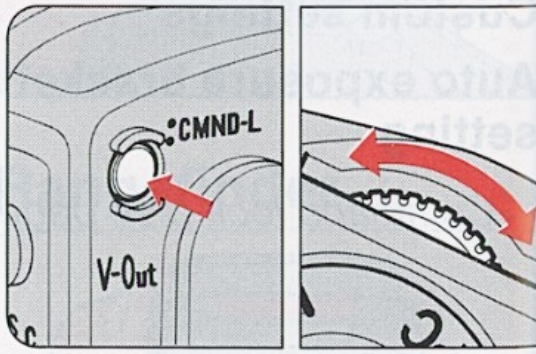
—To release the lock, rotate the command dial in either direction while pressing the CMND-L button.



In A or M mode

While pressing the CMND-L button, rotate the aperture dial in either direction, and the aperture value will be locked with an L appearing next to the aperture value on the LCD panel.

—To release the lock, rotate the aperture dial in either direction while pressing the CMND-L button.



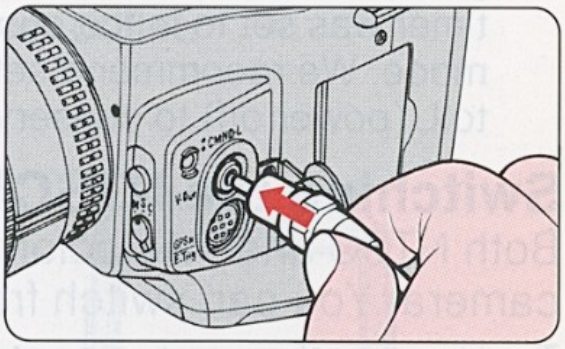
monitor through a video output connector, exposed image data can easily be downloaded to a personal computer using Nikon's PC Card Drive ED-10 or other digital processing equipment.
In this manual we will explain how to playback pictures on a TV monitor only.
—For details on other systems, refer to the instruction manuals for the relevant equipment.

Important
You cannot playback image data recorded with cameras other than the E3/E3s camera.

Playback on a TV monitor

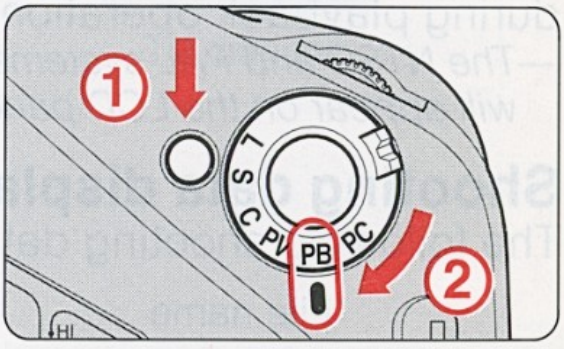
1 Connect the camera to a TV monitor.

Connect Video Cable EG-10 (provided) to the camera's video output terminal and the monitor's video input terminal.
—Remove the terminal cap on the V-Out and GPS IN/E.Trig. terminals.
(See page 10.)



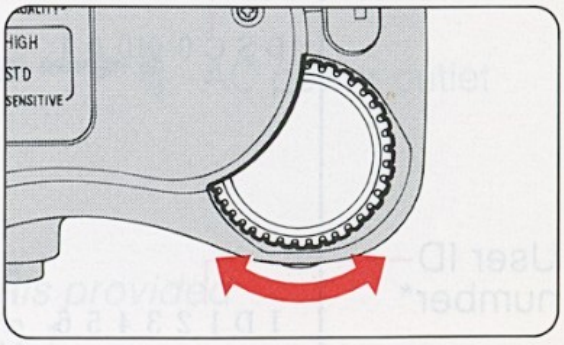
2 Rotate the Main dial to PB (playback) while pressing the Main dial lock-release button.

—The white balance mode marks ■ on the LCD panel all blink at once.



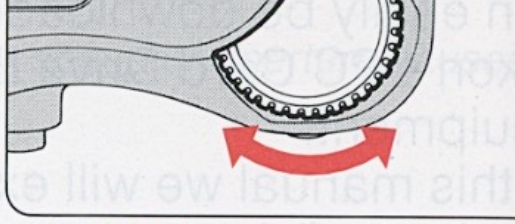
3 Rotate the command dial.

Rotate the command dial once in either direction to playback one frame.
—While playing back pictures, the white balance mode marks ■ light up one after the other.

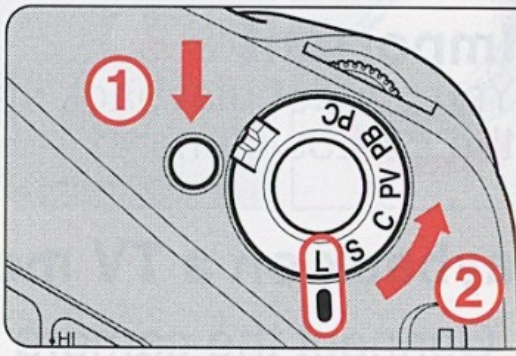


Rotate the dial counterclockwise to move the frames forward and clockwise to move them backward.

—When you wish to playback a particular frame, first rotate the command dial while pressing the SENS button to specify the frame number, then remove your finger from the SENS button.



5 When finished, rotate the Main dial to L (power off).



The playback function automatically stops after 3 minutes when the camera is not in use, and then the power turns off after 16 sec. or the amount of time the power-hold timer was set to in the custom settings mode. We recommend setting the Main dial to L (power off) to conserve battery power.

Switching the NTSC/PAL systems

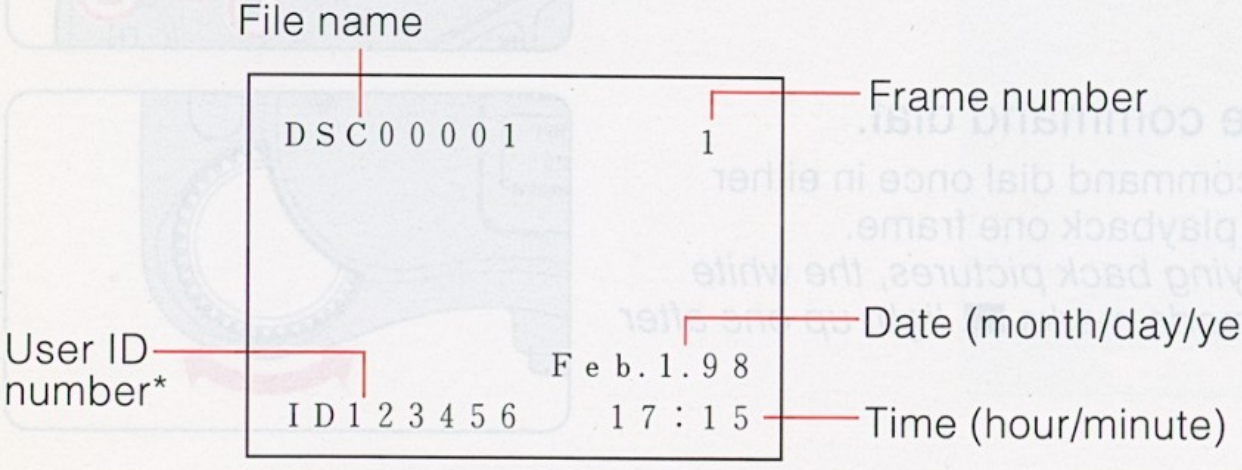
Both NTSC and PAL color television systems are available with this camera. You can switch from NTSC to PAL or vice versa.

To change the system, rotate the command dial while pressing the Metering system and Exposure compensation buttons simultaneously during playback operation.

—The NTSC and PAL systems change alternatively and the system indicator will appear on the LCD panel.

Shooting data displayed on the playback screen

The following shooting data can be displayed on the TV monitor.



The above screen shows the NTSC system. The date order differs in the PAL system (day/month/year).

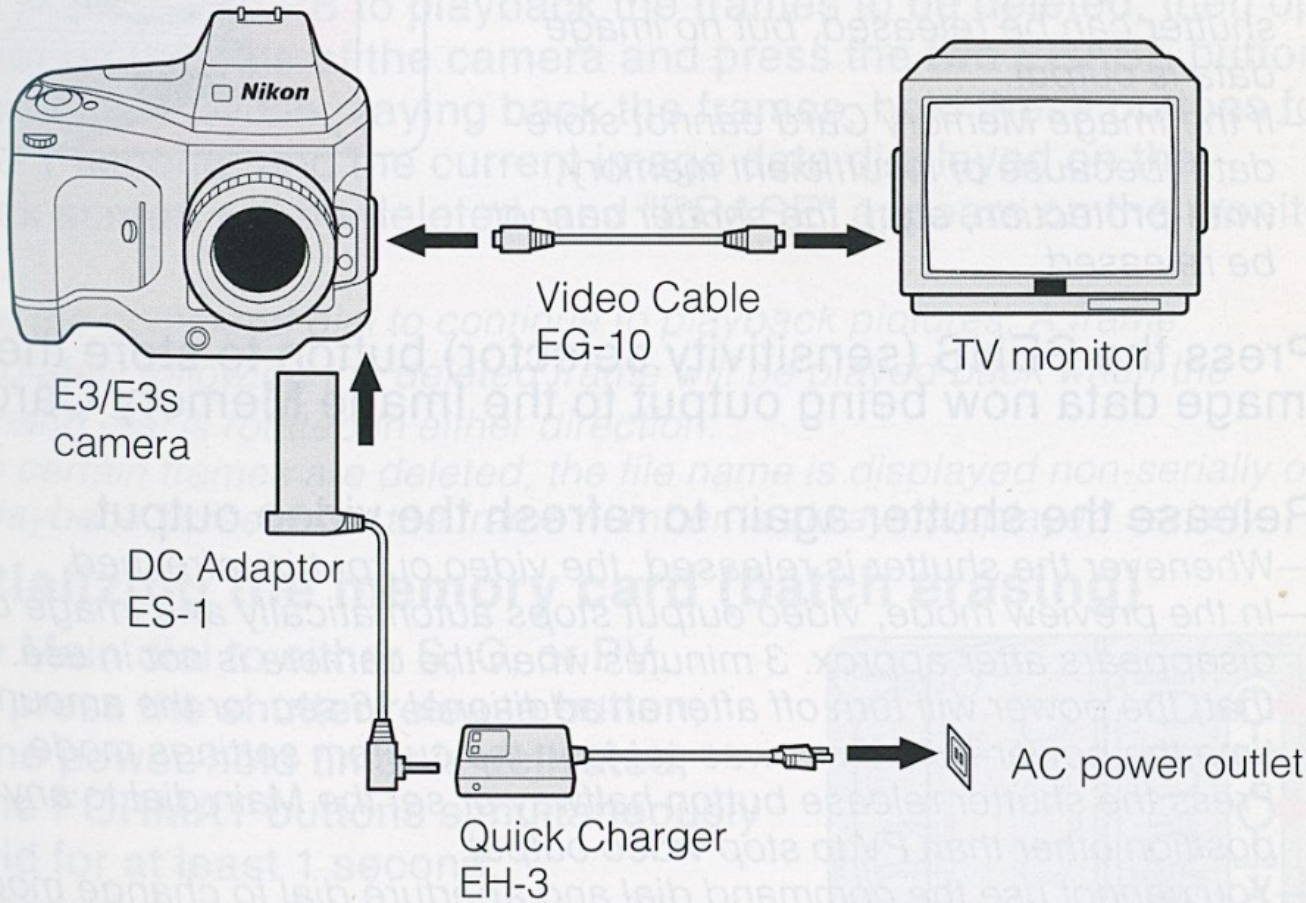
**User ID numbers are displayed on the screen only when frames recorded with user ID numbers are played back.*

On-screen data appears in the order shown below.

LCD panel	TV monitor
dSP 0	None
dSP 1	Frame number
dSP 2	Frame number, date and time
dSP 3	Frame number, date and time, file name, ID number

Long-play playback method

You can playback continuously for approx. 60 minutes using a fully charged battery pack (EN-3). If you want to playback for a longer period of time, use the optional battery charger (EH-3) and DC adaptor (ES-1)* to power the camera from an AC power outlet.

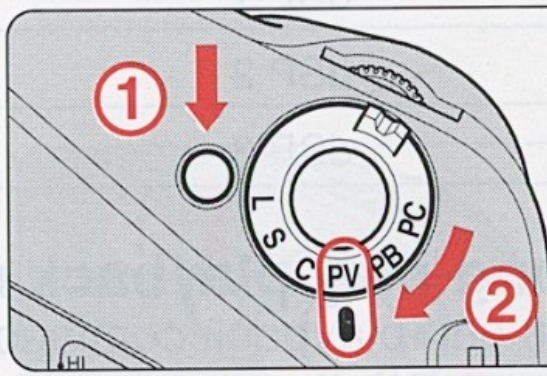


For more details, read the instruction manuals provided with the Quick Charger EH-3/DC Adaptor ES-1.

composition and exposure beforehand.
You can also record the previewed images on an Image Memory Card.

1 Set the Main dial to PV.

While pressing the Main dial lock-release button, rotate the Main dial to PV.

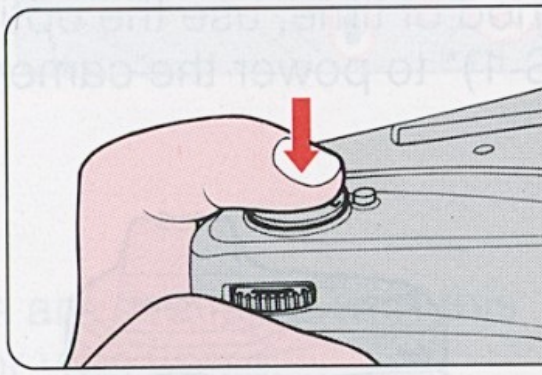


2 Release the shutter.

Image data is output from the V-Out (video output) terminal.

—If no Image Memory Card is inserted, the shutter can be released, but no image data is output.

—If the Image Memory Card cannot store data (because of insufficient memory, write-protection, etc.), the shutter cannot be released.



3 Press the SENS (sensitivity selector) button to store the image data now being output to the Image Memory Card.

4 Release the shutter again to refresh the video output.

—Whenever the shutter is released, the video output is refreshed.

—In the preview mode, video output stops automatically and image data disappears after approx. 3 minutes when the camera is not in use. After that, the power will turn off after an additional 16 sec. or the amount of time the power-hold timer was set to in the custom settings mode. Press the shutter release button halfway or set the Main dial to any position other than PV to stop video output.

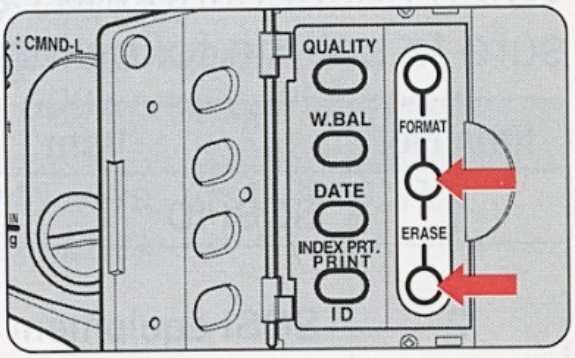
—You cannot use the command dial and aperture dial to change modes and values during video output. To cancel the settings, stop the video output operation once.

● Important

If the shutter is released while the video signal is being output, a time lag occurs, because the video output is first stopped, then the shutter is releas

1. Erasing the data frame by frame.
2. Initializing the memory card (batch erasing)

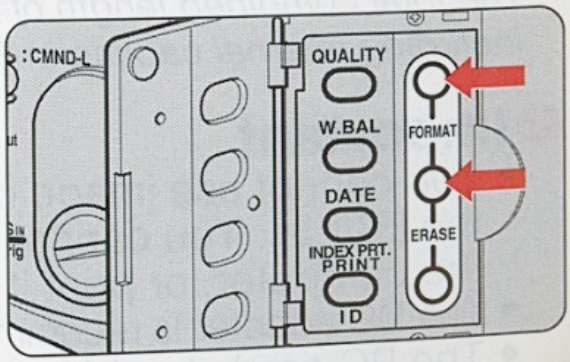
1. Deleting data frame by frame



Set the Main dial to either S, C, or PV, and open the cover on the side of the camera, then lightly press the shutter release button (see page 34); while the camera power-hold timer is activated, push two ERASE buttons simultaneously and hold for at least 1 second.
The most recently recorded data will be erased and the frames-shot counter in the LCD panel and the viewfinder will count down by one frame.
—To continue erasing data, remove your finger once and press the buttons again.

Set the Main dial to PB to playback the frames to be deleted, then open the cover on the side of the camera and press the two ERASE buttons simultaneously. While playing back the frames, hold these buttons for at lease 1 second, and the current image data displayed on the playback screen will be deleted, and "ERASE" appears on the monitor screen.
—Rotate the command dial to continue to playback pictures. A frame immediately following the deleted frame will be played back when the command dial is rotated in either direction.
—When certain frames are deleted, the file name is displayed non-serially on the playback screen, but the frame number is always displayed serially.

2. Initializing the memory card (batch erasing)



Set the Main dial to either S, C, or PV.
Lightly press the shutter release button; while the power-hold timer is activated, push the FORMAT buttons simultaneously and hold for at least 1 second.
All recorded data will be erased and the frames-shot counter in the LCD panel and the viewfinder will return to 1.
When using a new Image Memory Card, be sure to initialize the card.
—Erasing time varies depending on the type of card and its storage capacity

computer, transfer and store the shooting data in the computer or print out the shooting data. (Dedicated computer software is required to connect the camera to a computer.)
When connecting the camera to the SCSI equipment, make sure to set the following settings:

Item No.	Item	Setting No.	Setting
1	SCSI ID	0—7	6 (factory setting)
2	SCSI equipment	0	Personal computer (factory setting
		1	Printer
3	Printing paper	0	Printing paper size (0)
		1	Printing paper size (1) (factory setting

—This camera has no SCSI terminator power supply capability. When connected to computers (such as Apple PowerBook series, or other portable computers incorporating a PCMCIA SCSI card that have no SCSI terminator power supply capability), you must connect the camera to equipment (such as a hard disk drive having a SCSI terminator power supply capability.

—When the camera is connected to SCSI equipment, the DC adapter should be use

—Up to 8 pieces of SCSI equipment can be connected together. Make sure that SCSI hard disk drives and CD-ROM drives built in the computer are included whe calculating the total number of SCSI units used.

—SCSI ID numbers are assigned to each piece of SCSI equipment, such as the har disk drive, CD-ROM drive, and host computer. When the Setting No. is set to "1" for printer, the camera's SCSI ID will be set automatically to "6". Pay special attention to the SCSI ID numbers when connecting the camera to SCSI equipmen If the same SCSI ID number is repeated, the computer system may not start up or data on the hard disk drive may be lost.

—The total combined length of SCSI cables should not exceed 6m (19.7 ft.) including internal cabling in PC or Mac.

Important

- You cannot use image data that was recorded with cameras other tha the E3/E3s. You cannot transfer it to a personal computer, store it in the computer, or print it out on a dedicated printer.
- The DC adapter is recommended when using the camera in the PC mode.
- The PC card should be inserted in the camera body when using the camera in the PC mode. If no PC card is inserted, the shutter can be released, but no image data is output.
- No image data can be recorded on the PC card when using the camera in the PC mode.

personal computer connected

For Windows machines

Personal computer:	*IBM PC/AT compatible*
CPU:	*Pentium 100MHz – Pentium II*
OS:	*Windows 95, WindowsNT4.0*
Memory:	*32MB or more (48MB recommended)*
Monitor:	*Resolution of 800 x 600 or more, 256 colors or more*
SCSI card:	*Adaptec's AHA-2940 Ultra, AHA-2940 (PCI bus), AHA-1540 (ISA bus)*

For Macintosh machines

Personal computer:	*Apple Macintosh*
CPU:	*PowerPC*
OS:	*Mac OS 7.6 or Mac OS 8*
Memory:	*32MB or more (48MB recommended)*
Monitor:	*Resolution of 800 x 600 or more, 256 colors or more*

Printers that can be connected to the E3/E3s camera and printing paper size

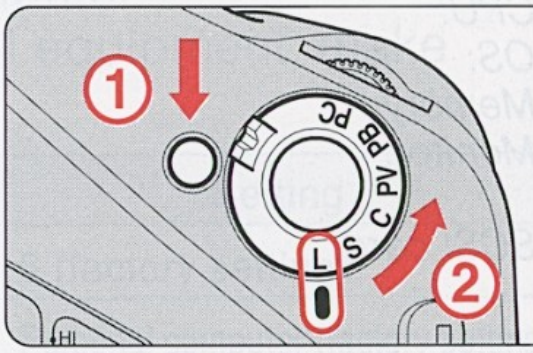
Printer	Printing paper size (0)	Printing paper size (1)
PG3000*	A4	A5
NC-500*	A4	A5
NC-300D*	A5	A6

**Product of Fuji Photo Film Co., Ltd.*

Images displayed on the monitor may differ from those printed out on paper.

Be sure that the power to all SCSI equipment (including the personal computer) is off before connecting it to the camera using SCSI cables.

1 Rotate the Main dial to L (camera power off).



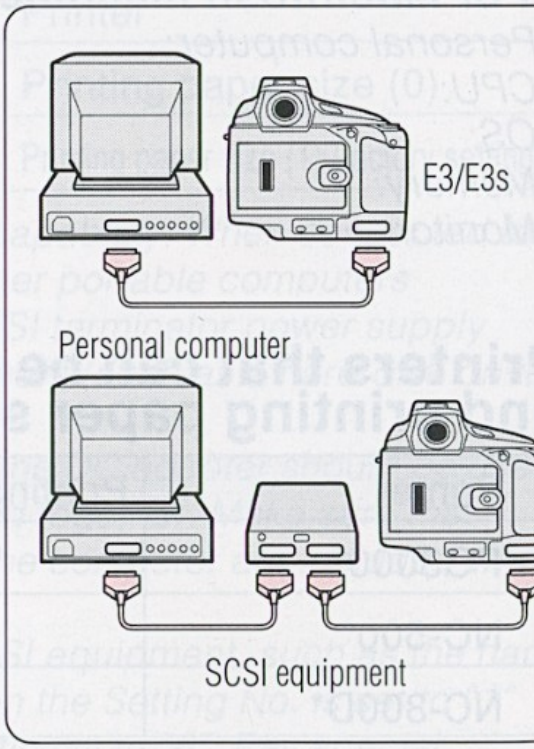
2 Connect the SCSI equipment using SCSI cables.

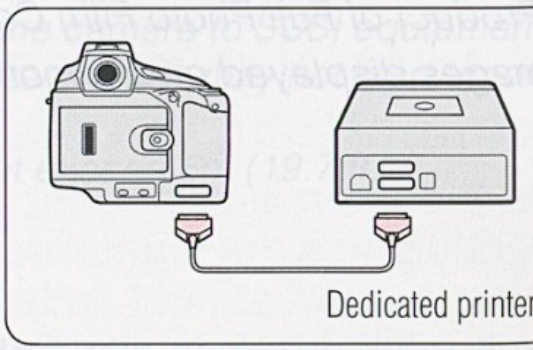
—Use a SCSI cable with D-sub 25-pin (lock nut size #4-40) connector for connection to the camera, while the other end matches the type of SCSI equipment to be connected.

—As this camera comes with only one SCSI connector, connect the camera so that it is at the end of the SCSI chain connection.

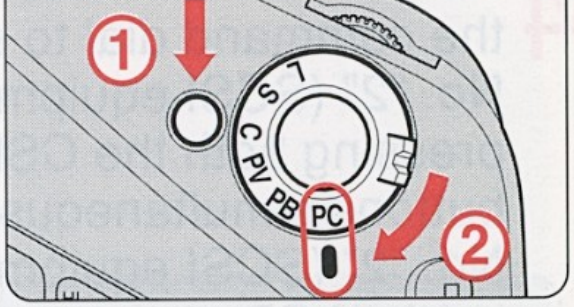
—When connecting a personal computer, turn on the power of the camera and SCSI equipment in this order:
Camera → Other SCSI equipment → Personal computer

—When connecting a dedicated printer, turn on the power of camera and SCSI equipment in this order:
Dedicated printer → Camera

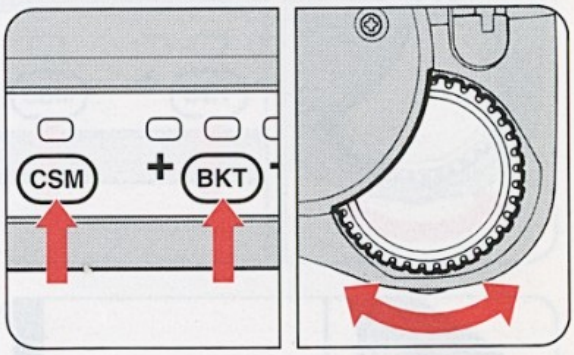


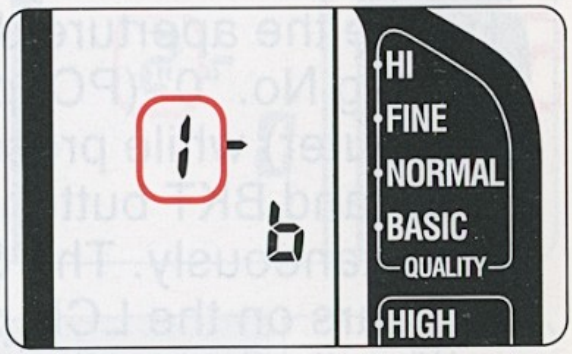


pressing the Main dial lock-release button.

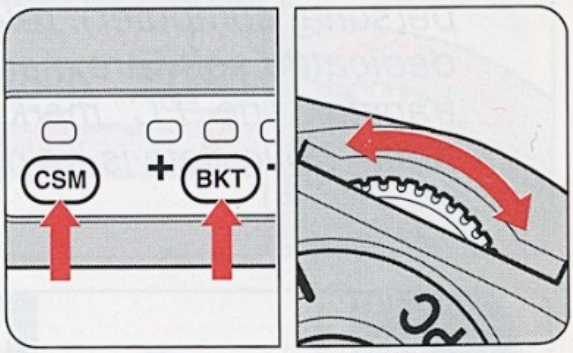


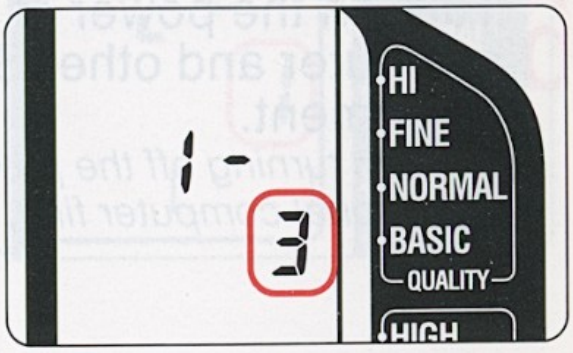
2 Rotate the command dial to select Item No. "1" (SCSI ID) while pressing both the CSM (custom setting mode) and BKT (bracketing) buttons simultaneously. The Item No. "1" (SCSI ID) appears on the LCD panel.





3 Rotate the aperture dial to choose any Setting No. from "0" to "7" while pressing both the CSM and BKT buttons simultaneously. The Setting No. selected from "0" to "7" appears on the LCD panel.

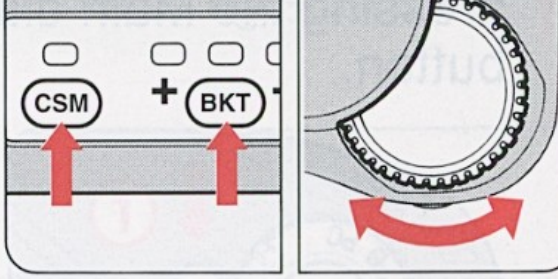


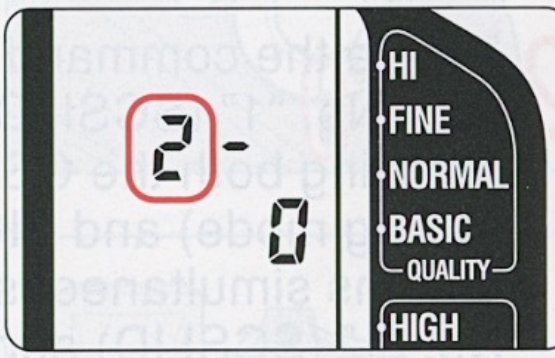


Important

If you change the SCSI ID number, rotate the Main dial to L (power off), then back to PC again to make the new ID number take effect.

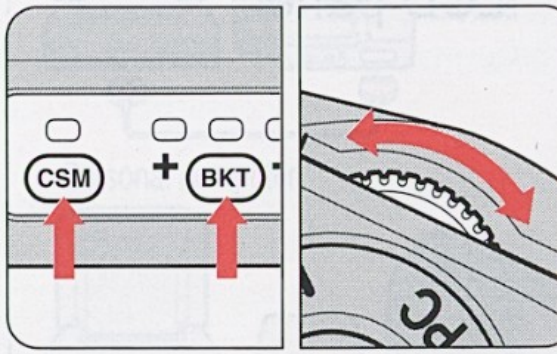
4 the command dial to select Item No. "2" (SCSI equipment) while pressing both the CSM and BKT buttons simultaneously. The Item No. "2" (SCSI equipment) appears on the LCD panel.

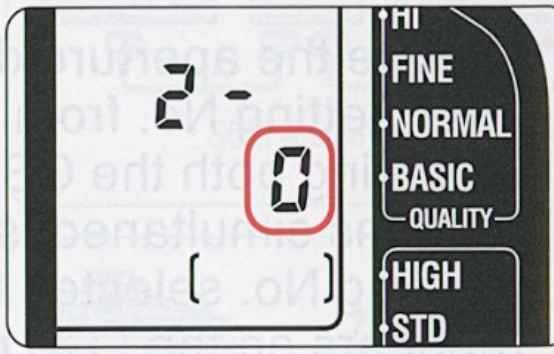




5 Rotate the aperture dial to choose Setting No. "0" (PC: personal computer) while pressing both the CSM and BKT buttons simultaneously. The Setting No. "0" appears on the LCD panel.

—When the Setting No. is set to "0" (PC: personal computer), refer to the dedicated software manual for data transfer. The "PC" mark blinks on the LCD panel while data is being transferred.



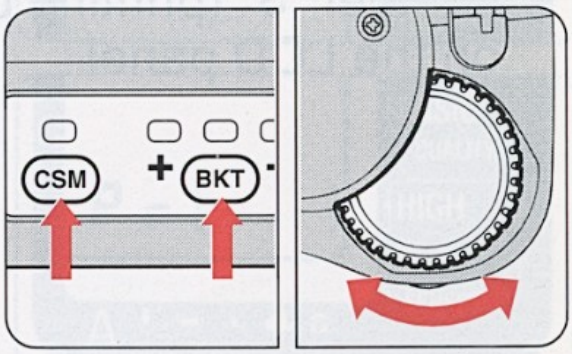


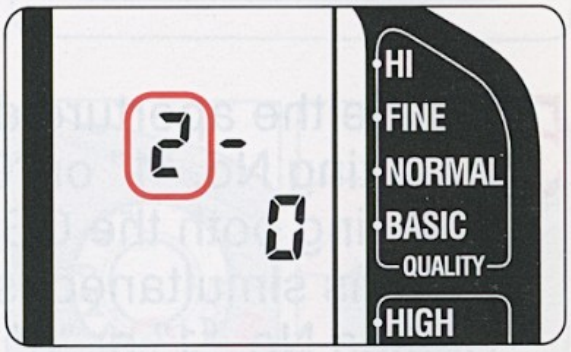
6 Turn on the power of personal computer and other SCSI equipment.

—When turning off the power, turn off the personal computer first, then the camera.

—First turn off the power to the camera, then turn off the printer.

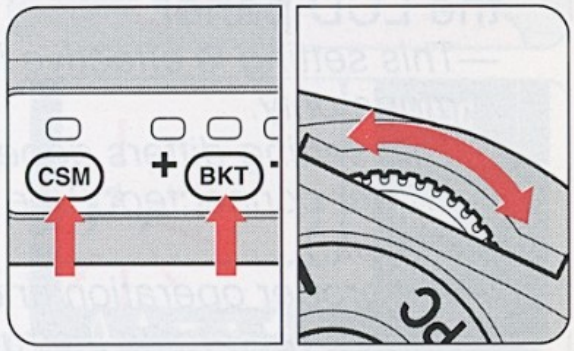
2 Rotate the Main dial to PC. Rotate the command dial to select Item No. “2” (SCSI equipment) while pressing both the CSM and BKT buttons simultaneously. The Item No. “2” (SCSI equipment) appears on the LCD panel.

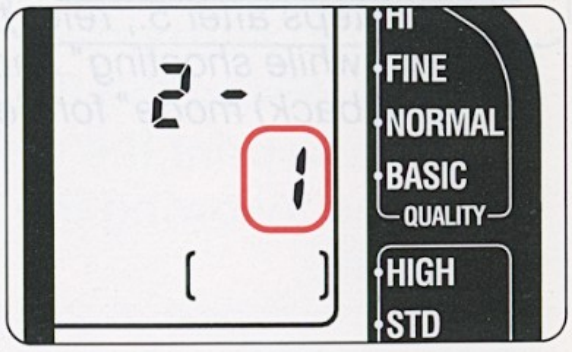




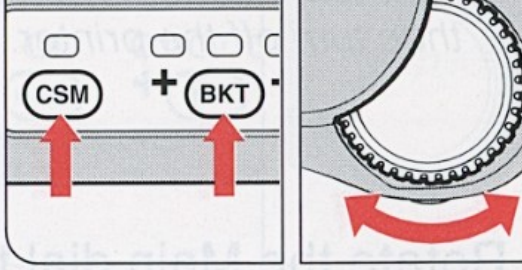
3 Rotate the aperture dial to choose a Setting No. “1” (Pr: printer) while pressing both the CSM and BKT buttons simultaneously. The Setting No. “1” appears on the LCD panel.

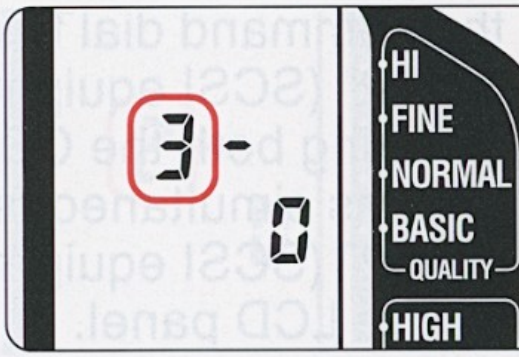
—When the Setting No. is set to “1” for printer, the camera’s SCSI ID will be set automatically to “6”. Therefore, set the printer’s SCSI ID to a number other than 6.





4 the command dial to select Item No. "3" (printing paper) while pressing both the CSM and BKT buttons simultaneously. The Item number "3" (printing paper) appears on the LCD panel.



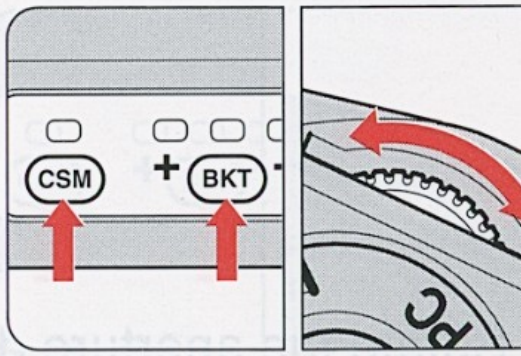


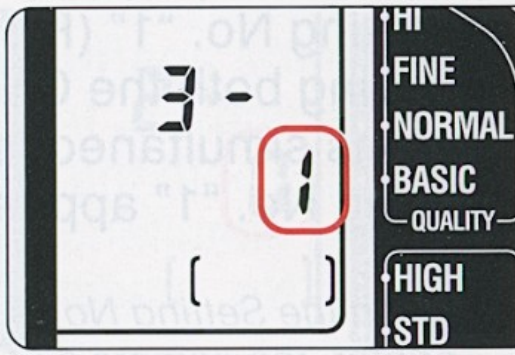
5 Rotate the aperture dial to choose a Setting No. "1" or "0" while pressing both the CSM and BKT buttons simultaneously. The Setting No. "1" or "0" appears on the LCD panel.

—This setting is effective in the Pr (printer) mode only.

—This setting differs depending on the printer connected. (See page 55 for details.)

—For proper operation and handling of the printer, refer to its instruction manual. For steps after 5., refer to "Printing image data while shooting" and "Printing in PB (playback) mode" for details.

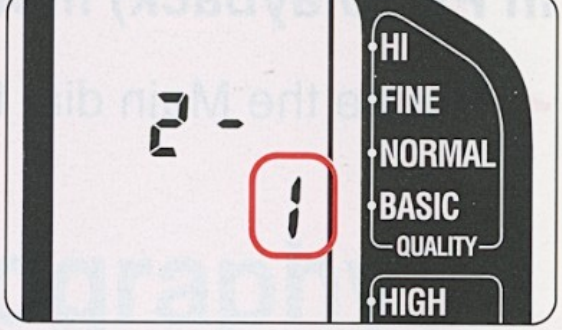


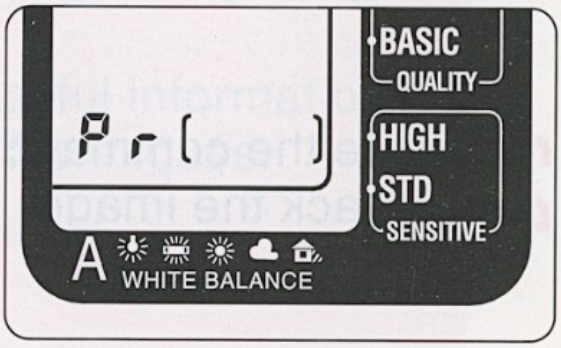


1 Perform the previously mentioned settings (SCSI ID, SCSI equipment, Printing paper) and connect the SCSI equipment to the camera correctly.

—Set the Setting No. to "1" (printer) for SCSI equipment.

—When the setting is completed, the "Pr" mark appears on the LCD panel.





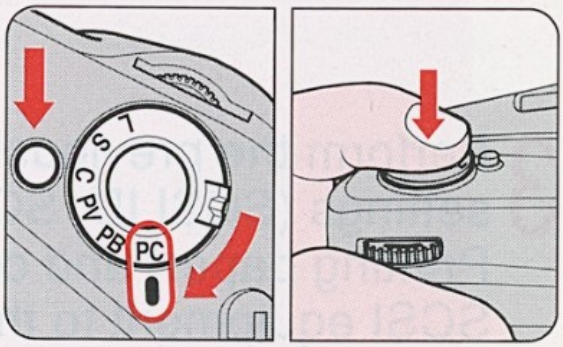
2 Release the shutter to transfer the shooting data to the printer. Then the shooting image will be printed out.

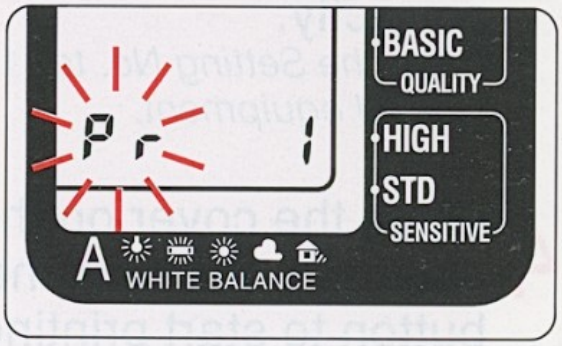
—Normal shooting is possible only when the Main dial is set to PC.

—The "Pr" mark blinks on the LCD panel while data is being transferred or printed out.

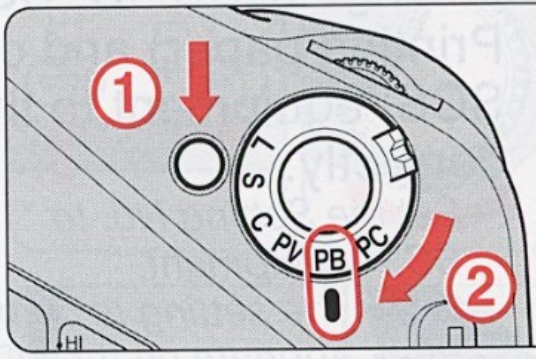
—No shooting image data can be recorded on the PC card.

—If no PC card is inserted, the shutter can be released, but no image data is output.

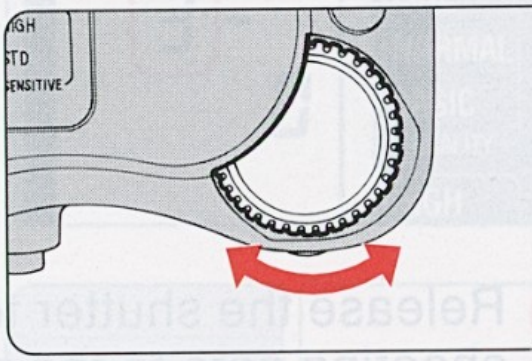




1 Rotate the Main dial to PB.

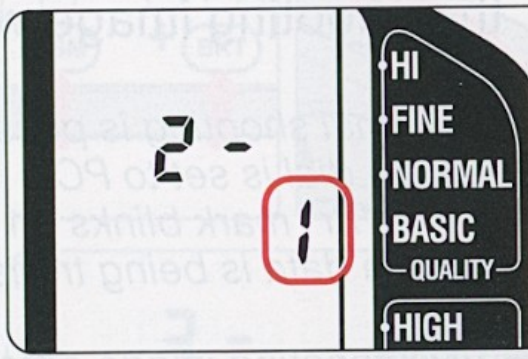


2 Rotate the command dial to playback the image.

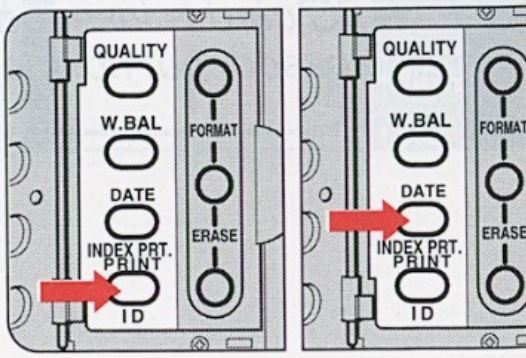


3 Perform the previously mentioned settings (SCSI ID, SCSI equipment, Printing paper) and connect the SCSI equipment to the camera correctly.

—Set the Setting No. to "1" (printer) for SCSI equipment.



4 Open the cover on the side of the camera and press the PRINT button to start printing the playback image. Press the INDEX PRINT button to print the index (thumbnail) images following the playback images.



Important

Only a limited number of index images can be printed out on the first sheet of printing paper. If you want to print out the next set of index images, play back the first frame of the next set, then follow the same procedure as above.

Advanced photography

In this section we provide some useful information on a variety of photographic techniques.

See page 31 for details on Programmed Auto operation.

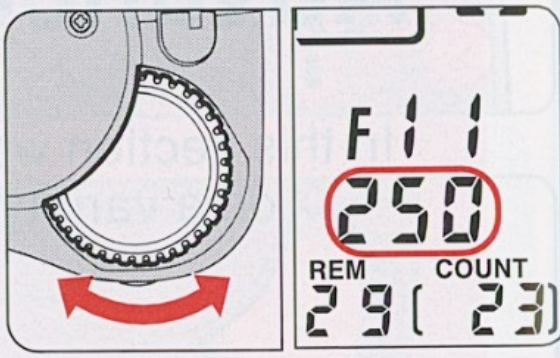
Rotate the command dial while pressing the MODE button until S appears on the LCD panel.

2 Set the shutter speed.

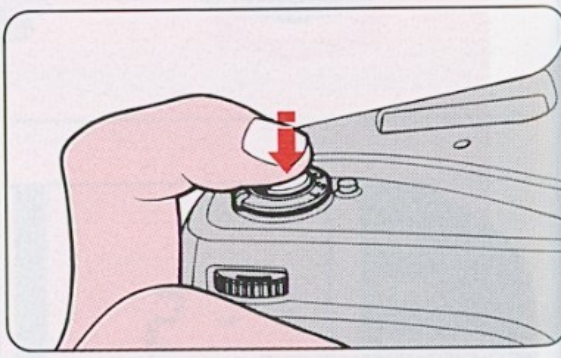
Rotate the command dial to set the shutter speed.

—*You can set shutter speeds from 1/8 to 1/2000 sec. in 1/2 step increments.*

—*The selected shutter speed appears in the viewfinder and the LCD panel.*

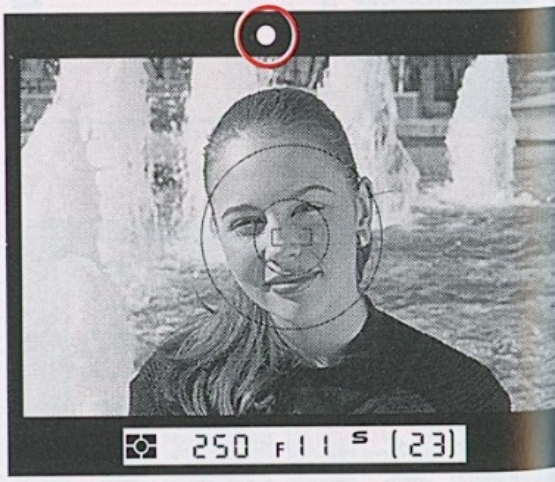


3 Compose the picture and press the shutter release button lightly.

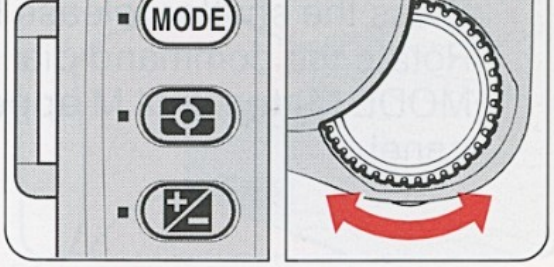


4 Check the focus indicator and fully depress the shutter release button to take the picture.

—*See pages 101-102 on warning indications.*



Press the shutter release button lightly. Rotate the command dial while pressing the MODE button until A appears on the LCD panel.

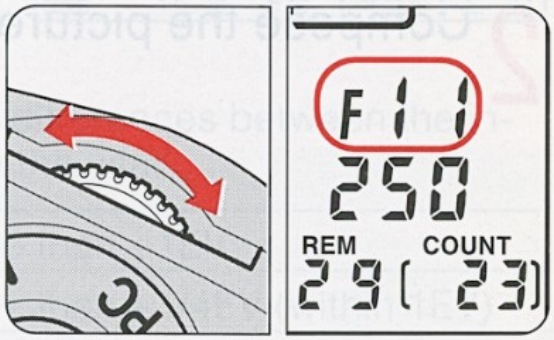


2 Set the aperture value.

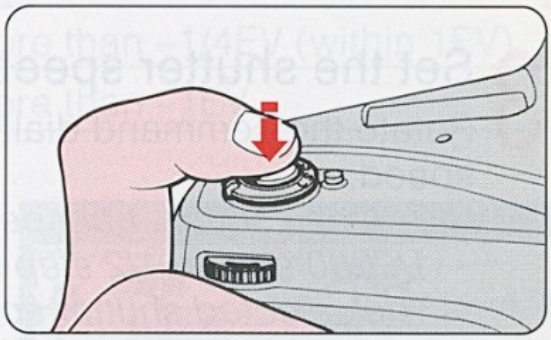
Rotate the aperture dial to set the aperture value.

—*You can set aperture values from f/4.8 to f/38 in 1/2 step increments.*

—*The selected aperture value appears in the viewfinder and on the LCD panel.*

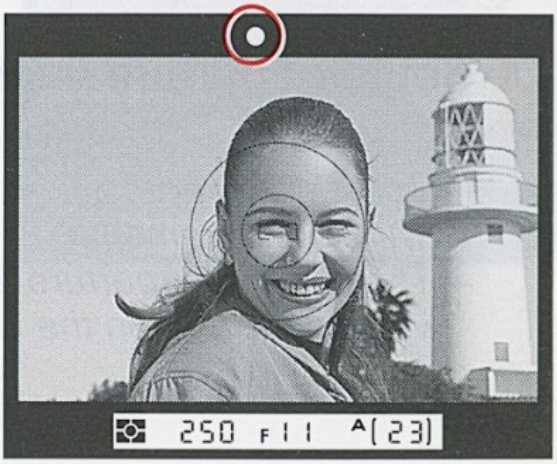


3 Compose the picture and press the shutter release button lightly.



4 Check the focus indicator and fully depress the shutter release button to take the picture.

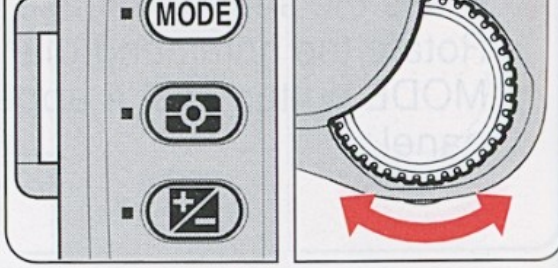
—*See pages 101-102 on warning indications.*



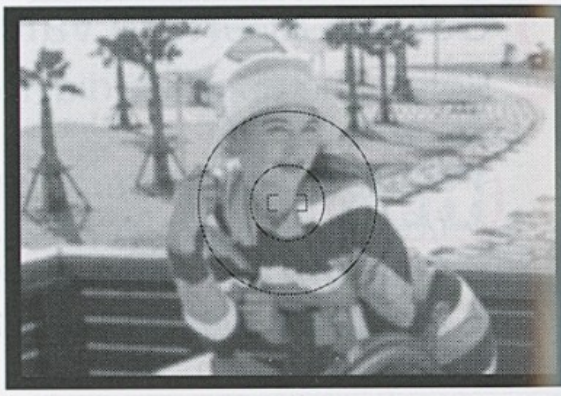
NOTE

Rotating the lens aperture ring does not change the aperture value. You can leave the lens aperture ring at any position when mounting the lens.

1 Press the shutter release button lightly. Rotate the command dial while pressing the MODE button until M appears on the LCD panel.



2 Compose the picture.

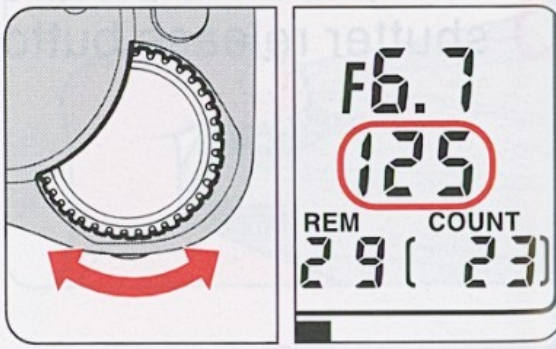


3 Set the shutter speed.

Rotate the command dial to set the shutter speed.

—*You can set shutter speeds from 1/8 to 1/2000 sec. in 1/2 step increments.*

—*The selected shutter speed appears in the viewfinder and the LCD panel.*

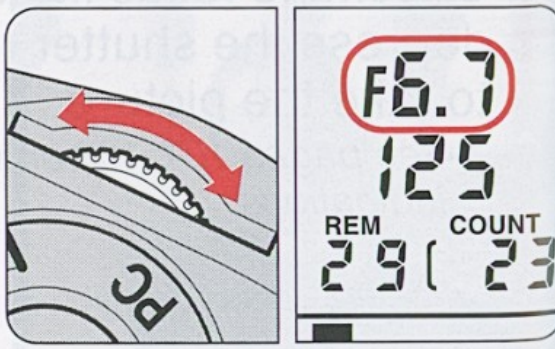


4 Set the aperture value.

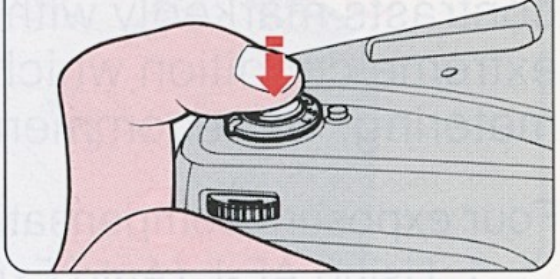
Rotate the aperture dial to set the aperture.

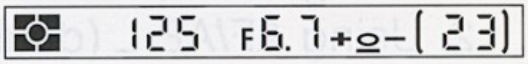
—*You can set aperture from f/4.8 to f/38 in 1/2 step increments.*

—*The selected aperture appears in the viewfinder and on the LCD panel.*



5 Referring to the exposure indicators, adjust the shutter speed and aperture value manually.





Exposure indicators

The exposure indicators in the viewfinder monitor differences between the in-camera measured exposure value and that set by the user.

±0−	Overexposure by more than +1EV
±0−	Overexposure by more than +1/4EV (within 1EV)
+0−	Correct exposure (within ±1/4EV)
+0=	Underexposure by more than –1/4EV (within 1EV)
+0=	Underexposure by more than –1EV

6 Check the focus indicator and fully depress the shutter release button to take the picture.

extreme condition which might prove difficult for Matrix metering, we recommend using exposure compensation.

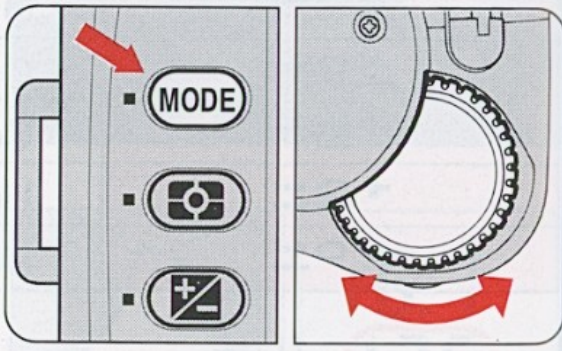
Four exposure compensation methods are available with this camera.

1. Using AE-L (Auto Exposure Lock)
2. Using AF/AE-L (double lock)
3. Using Exposure Compensation
4. Using Manual Exposure

Using AE-L (Auto Exposure Lock)

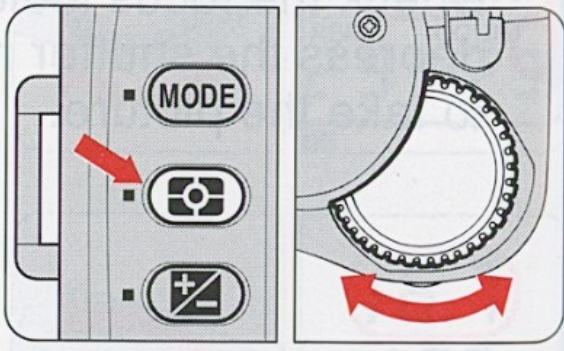
1 Set the exposure mode to either P, S, or A.

Do not set the exposure mode to M (Manual).



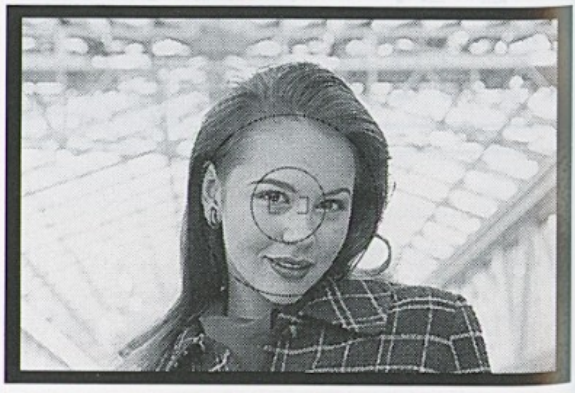
2 Set the metering system.

We recommend using Center-Weighted or Spot Metering.



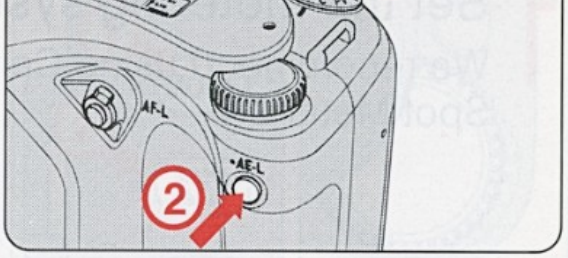
3 Center the main subject inside the viewfinder.

Move in close until the 12mm-diam. reference circle for Center-Weighted metering or 5mm-diam. reference circle for Spot metering is filled up with the subject.



Confirm that no exposure warning indicator appears and press the AE-L button.

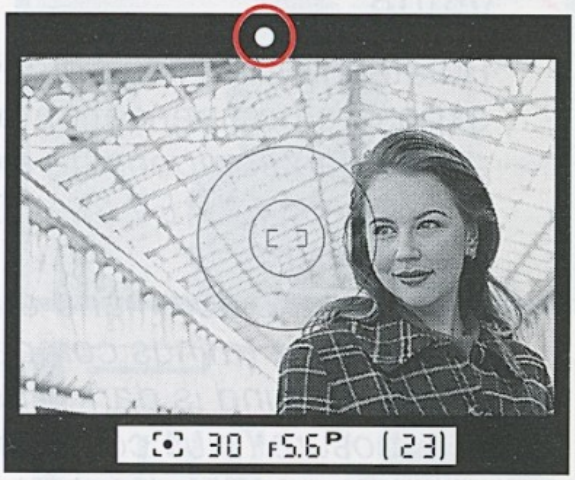
—You can remove your finger from the shutter release button, since the exposure value is stored in the camera for as long as the AE-L button is pressed. You can change the shutter speed in S mode and the aperture value in A mode.



5 Recompose the picture and shoot while keeping the AE-L button pressed.

Chek the focus indicator and fully depress the shutter release button to take the picture.

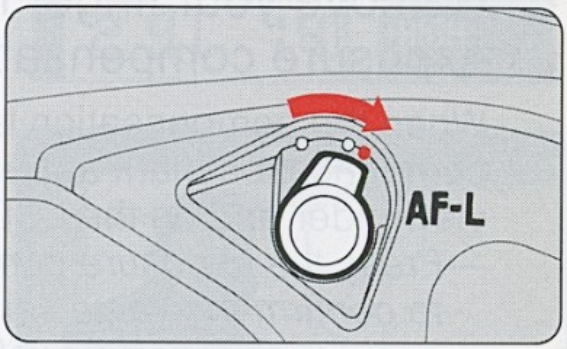
—Remove your finger from the AE-L button to release the lock.



Using AF/AE-L (double lock)

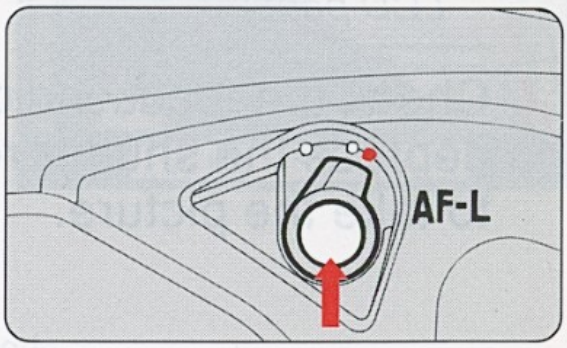
1 Set the AF/AE-L lever.

Slide the AF/AE-L lever to the double lock index □■.



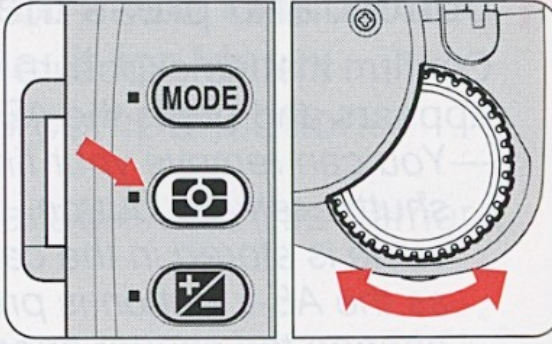
2 Repeat the same procedures as in "Using AE-L"

Press the AF-L button instead of the AE-L button. Focusing and exposure values are stored in the camera for as long as the AF-L button is pressed.



1 Set the metering system

We recommend using Center-Weighted or Spot Metering.

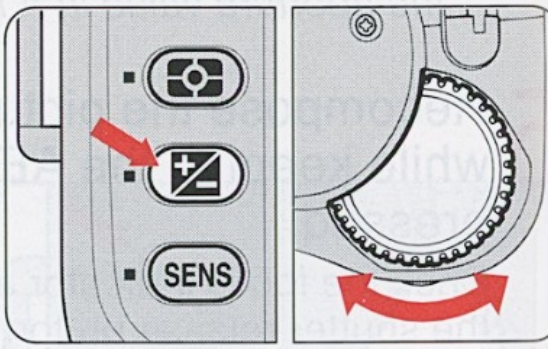


2 Set the exposure compensation value.

Rotate the command dial while pressing the exposure compensation button.

—*You can compensate exposure within a range of +2.0 EV to –2.0 EV (in 1/4 EV increments.)*

—*Rotate the command dial to decrease the exposure (minus compensation) when the background is dark, and increase the exposure (plus compensation) when the background is bright.*



3 Remove your finger from the exposure compensation button.

When the compensation is set, the exposure compensation mark appears in the viewfinder and on the LCD panel.

—*Press the exposure compensation button to confirm the value set and the compensation value will appear on the LCD panel.*

4 Check the focus indicator and fully depress the shutter release button to take the picture.

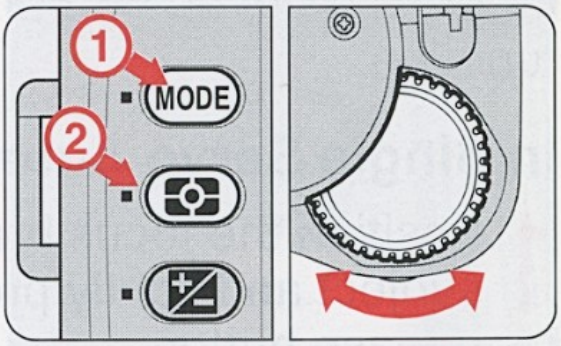
To cancel exposure compensation

Set the compensation value back to 0.0.

Using Manual Exposure

1 Set the exposure mode to M ① then set the metering system ②.

We recommend using Center-Weighted Metering or Spot Metering.

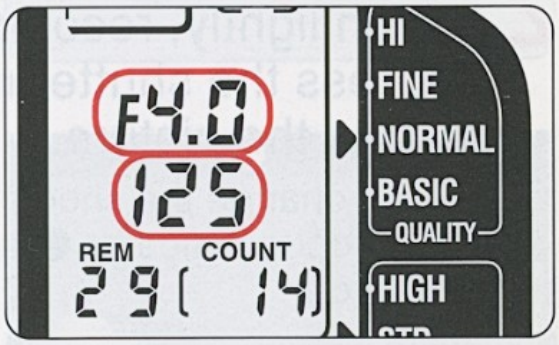


2 Center the main subject in the viewfinder

Move in close until the 12mm-dia. reference circle for Center-Weighted metering or 5mm-dia. reference circle for Spot metering is filled up by the subject.

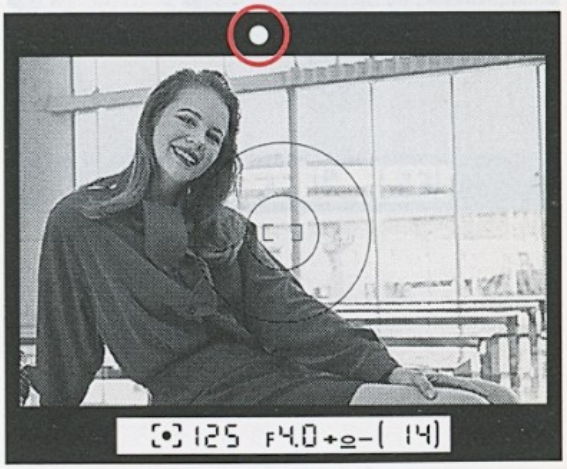
3 Set the shutter speed and aperture value to obtain a correct exposure.

—The exposure indicators in the viewfinder shows the differences between the in-camera measured exposure value and that set by the user.



4 Recompose the picture and shoot.

Check the focus and fully depress the shutter release button to take the picture.



Setting exposure compensation in manual mode (in 1/4 EV increments)

- Choose Setting No. 1 of Item No. 9. in the custom settings mode. (See "Custom settings," page 78.)
- While pressing the exposure compensation button, rotate the command dial to make exposure compensation (by changing the shutter speed) in +0.25 or – 0.25 step increments.
- In this case, the shutter speed indicator on the LCD panel blinks to indicate that the shutter speed is being modified in +0.25 or – 0.25 step increments.

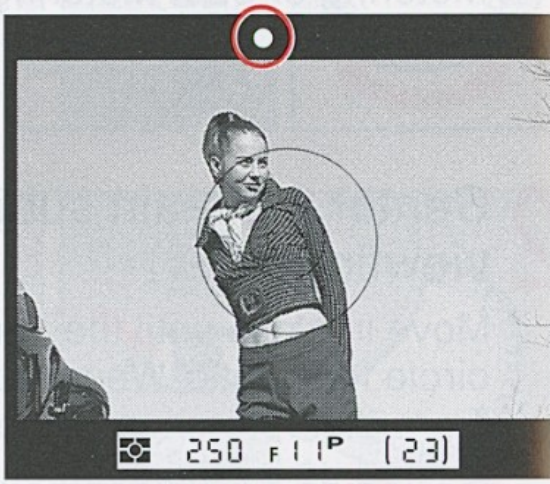
As the shutter speed indicator varies in 0.5 step increments, the shutter speed may change.

function.

In Single Servo Autofocus mode

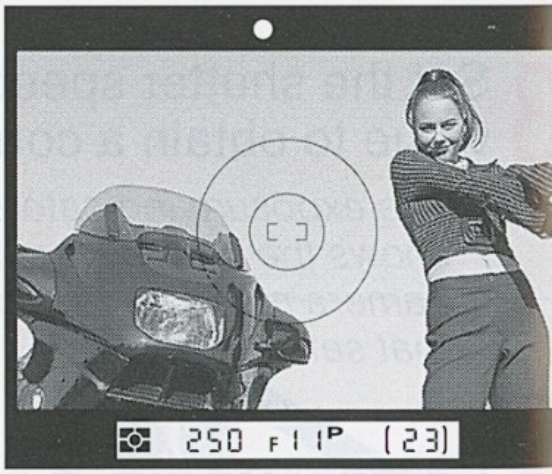
1 Position the focus brackets on the subject and lightly press the shutter release button.

Confirm that the in-focus indicator ● appears in the viewfinder; focus remains locked as long as the shutter release button is lightly pressed.



2 While pressing the shutter release button lightly, recompose, then fully depress the shutter release button to take the picture.

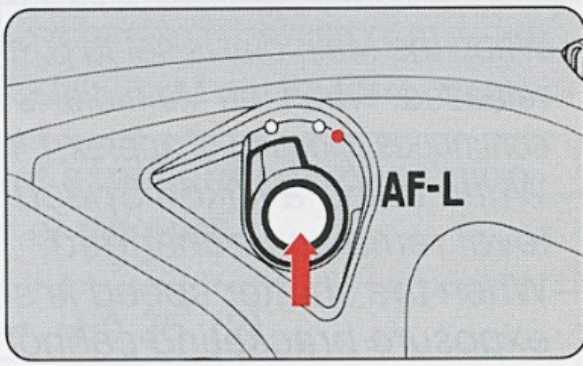
Do not change the shooting distance after the in-focus indicator ● appears in the viewfinder.



release button.

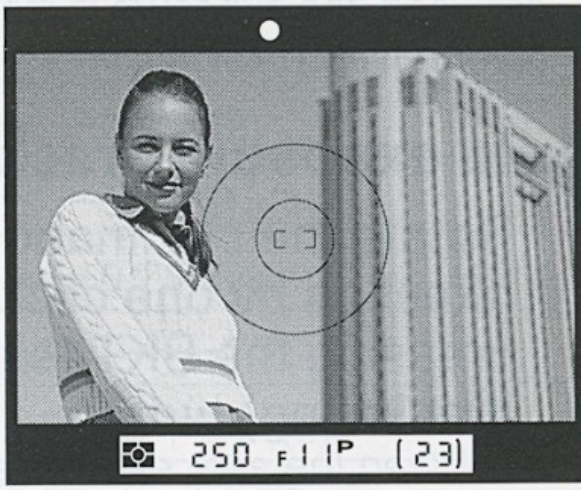
2 Confirm that the in-focus indicator ● appears in the viewfinder, then press and hold the AF-L button.

Focus is locked even if you remove your finger from the shutter release button for as long as the AF-L button is pressed.



3 While holding in the AF-L button, recompose and then fully depress the shutter release button to take the picture.

Do not change the shooting distance after the in-focus indicator ● appears in the viewfinder.



Auto Exposure Bracketing automatically lets you shoot the same subject at different exposures, varying the exposure each time. Depending on the exposure mode selected, the shutter speed and aperture are varied as follows:

Exposure mode	Contents
P	Both shutter speed and aperture are varied.
S	Aperture is varied.
A	Shutter speed is varied.
M	Shutter speed is varied.

—When the Main dial is set to S, exposure is varied frame by frame every time the shutter is released. When the Main dial is set to C, exposure is continuously varied (at low-speed continuous shooting of approx.1 frame/sec) while the shutter release button is kept depressed.

—When using a Nikon Speedlight, the aperture varies while the TTL flash output level remains unchanged.

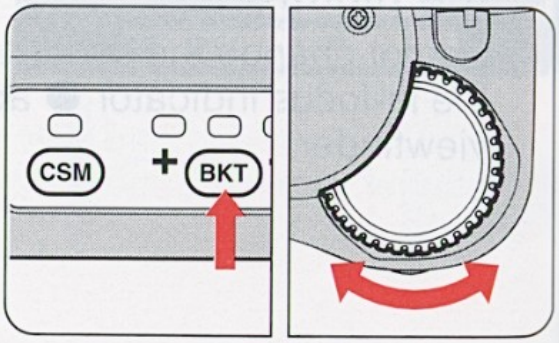
—When the shutter speed is set to Sy in the M (Manual) exposure mode, auto exposure bracketing cannot be performed.

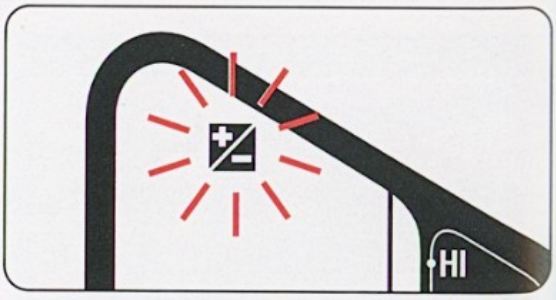
—When both auto exposure bracketing and exposure compensation (see page 68) are used, the exposure is modified by the sum total of both exposure compensation values.

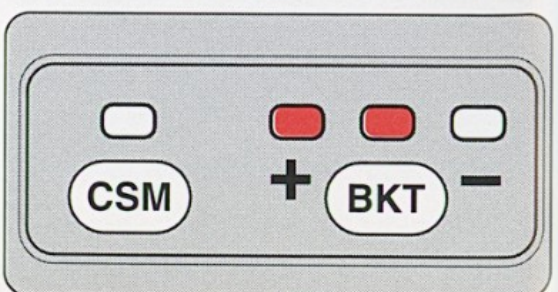
Auto exposure bracketing setting

1 Rotate the command dial in either direction by one click stop while pressing the BKT (exposure bracketing) button.

—When the auto exposure bracketing mode is set, the exposure compensation indicator blinks on the LCD panel and exposure bracketing LED lights up.





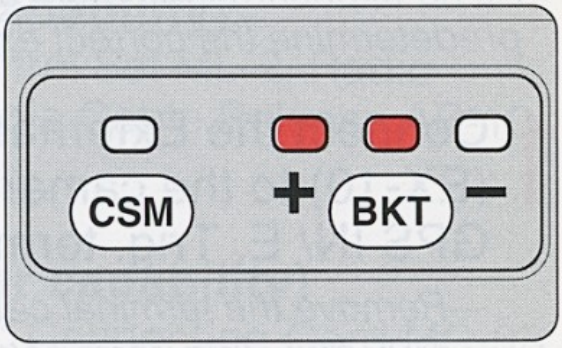


2 the amount of exposure compensation and number of frames.

—Rotate the aperture dial until the desired display appears on the LCD panel.

—The shutter speed and the amount of exposure compensation appear in the viewfinder every time shutter is released.

—The setting will not be canceled after shooting.



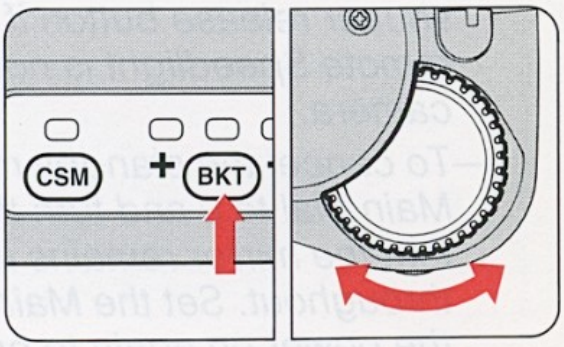
LCD panel	Exposure bracketing LED indicators			Amount of exposure compensation (Number of frames)
	+	(correct)	−	
2F+0.25	■	■	□	0 → +0.25 (2)
2F+0.5	■	■	□	0 → +0.5 (2)
2F+0.75	■	■	□	0 → +0.75 (2)
2F−0.25	□	■	■	0 → −0.25 (2)
2F−0.5	□	■	■	0 → −0.5 (2)
2F−0.75	□	■	■	0 → −0.75 (2)
3F 0.25	■	■	■	0 → −0.25 → +0.25 (3)
3F 0.5	■	■	■	0 → −0.5 → +0.5 (3)
3F 0.75	■	■	■	0 → −0.75 → +0.75 (3)

■ : Lights up

To cancel auto exposure bracketing

Rotate the command dial in either direction by one click stop while pushing the BKT button on the side of the camera. The exposure bracketing LED and exposure compensation indicators on the LCD panel disappear.

—Even after canceling the auto exposure bracketing mode, the amount of exposure compensation and number of frames set will remain in memory.



triggered by the firing of a flash on another camera situated nearby. Shutter speed is set at 1/60 sec.

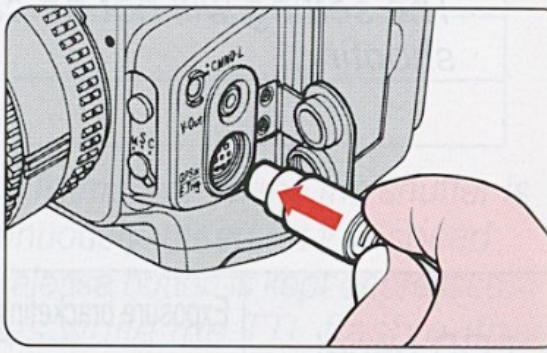
—*Optional External Sync Adaptor EX-10 (with a light sensor) is necessary.*

—*For external synchro-flash shooting, do not mount a Speedlight on this camera.*

—*As no exposure indicators appear in the viewfinder, we recommend that you predetermine the correct exposure.*

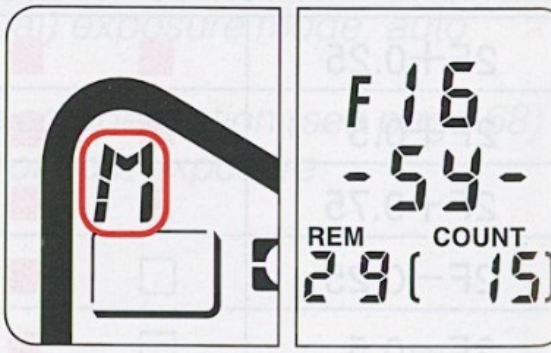
1 Connect the External Sync Adaptor (EX-10) to the camera's GPS IN/ E. Trig. terminal.

—*Remove the terminal cap on the V-Out and GPS IN/E.Trig. terminals. (See page 10.)*



2 Set the exposure mode to M and shutter speed to Sy.

Set the exposure mode to M (manual) and rotate the command dial to set the shutter speed to Sy.

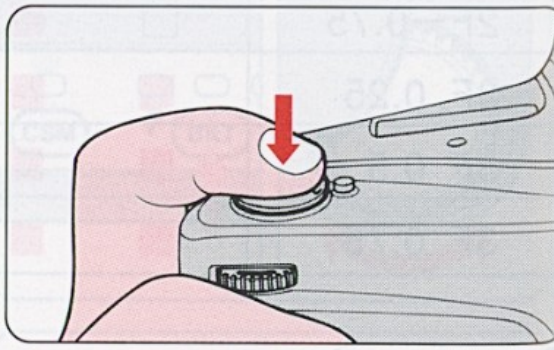


3 Depress the shutter release button to take the picture.

The "Sy" mark blinks on the LCD panel to indicate that the camera is in standby mode; pictures are taken in sync with the firing of the remote Speedlight.

—*The standby mode will be canceled approx. 2 minutes after depressing the shutter release button if the firing of the remote Speedlight is not detected by the camera.*

—*To cancel the standby mode, rotate the Main dial to L and turn the power off. Note that the mirror remains in the up position throughout. Set the Main dial to L and turn the power on again to bring the mirror back down.*



The optional accessories listed below make it possible to release this camera's shutter from a remote location by connecting them to the camera's remote terminal. Halfway shutter release operations are possible with power-hold timer enabled accessories, but not with the others.

Accessories (with power-hold timer capability)

Remote Cord MC-12B, Modulite Remote Control Set ML-2, Radio Control Set MW-2, Intervalometer MT-2, Double Cable Release AR-10

—You can set the focus mode to either S, C, or M.

Accessories (without power-hold timer capability)

Terminal Shutter MR-3, Remote Cord MC-4A, Connecting Cord MC-3A, Modulite Remote Control Set ML-1, Radio Control Set MW-1

—Set the focus mode to S or M. (C is not an option).

—Fully depress the shutter release button to take the picture.

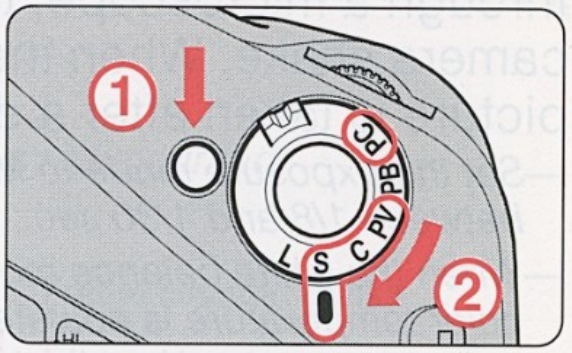
—Remove your finger from the shutter release button once before taking the next picture.

—When using Modulite Remote Control Set ML-1 or ML-2, read the ML-1 or ML-2 instruction manual.

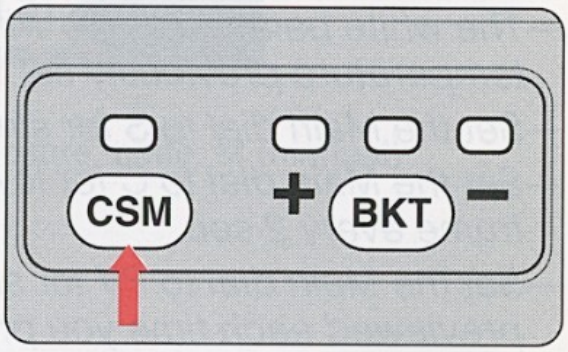
The 9 functions listed below can be selected.

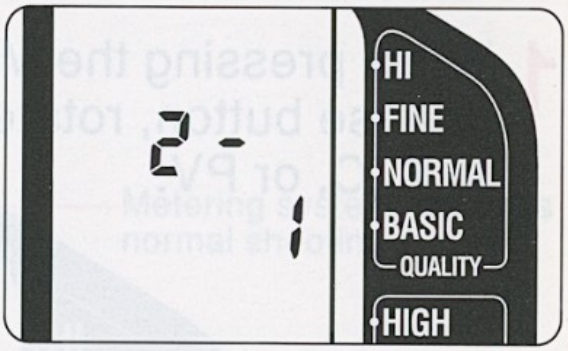
Item No.	Item	Setting No.	Results
1	Direction of command dial rotation	0	Normal direction (factory setting
		1	Reverse direction
2	Setting AE-L (Auto Exposure Lock) by pressing the shutter release button halfway	0	AE-L does not function (factory setting
		1	AE-L functions.
3	Modifying power-hold timer	L4	4 seconds
		L8	8 seconds
		L16	16 seconds (factory setting
		L32	32 seconds
		L180	180 seconds
4	Setting aperture in A mode	0	Front dial (factory setting)
		1	Rear dial
5	Front focus and rear focus indication in AF mode	0	Indicator appears (factory settin
		1	No indicator appears
6	AF operation by pressing shutter release button halfway	0	AF operation does not work (factory settin
		1	AF operation works
7	User ID number recording on Image Memory Card	0	No recording (factory setting
		1	Recording
8	Image quality selection mode	0	Regular mode (factory setting)
		1	Clear outline mode
		2	Printing mode
		3	Black and white mode
9	Setting exposure compensation in manual mode (in 1/4 EV increments)	0	Settings impossible (factory settir
		1	1/4 step EV settings possibl

1 While pressing the Main dial lock-release button rotate the Main dial to S, C, PV, or PC (Pr).

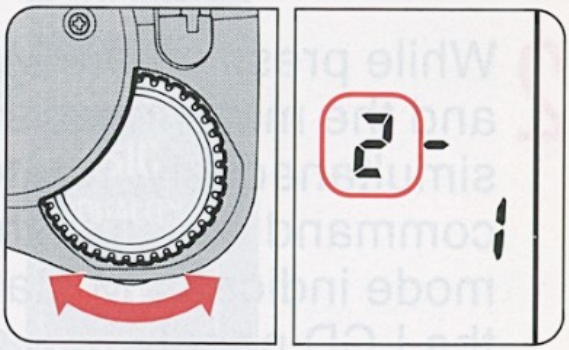


2 Press the CSM (custom settings mode) button on the camera back to enter the custom settings mode. The previously set Item No. and Setting No. appear on the LCD panel.

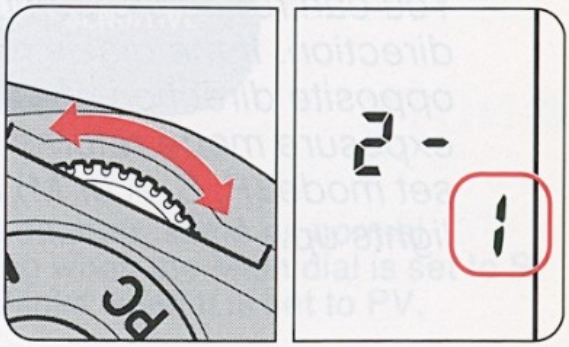




3 While holding down the CSM button, rotate the command dial to select an Item No., referring to the table.



4 While holding down the CSM button, rotate the aperture dial to select the Setting No., referring to the table.



camera shake. When the shutter release button is pressed, the picture is taken after a delay of approx. 0.2 to 0.3 sec.

—*Set the exposure mode to M (manual mode only) and set the shutter speed between 1/8 and 1/30 sec.*

—*When the white balance mode is set to A (Auto) without a lens mounted, the color temperature is adjusted to 5100K. For other white balance modes, the color temperature is adjusted as described on pages 40-42.*

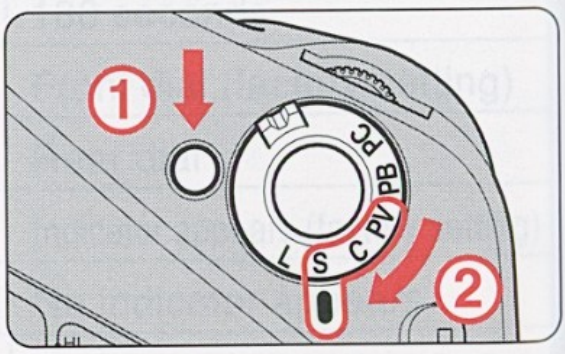
—*The white balance mode with a lens mounted is adjusted to the color temperature previously set.*

—*Set the Main dial to S for single-frame shooting.*

—*Set the Main dial to C for low-speed, continuous shooting at approx. one frame every 2 sec.*

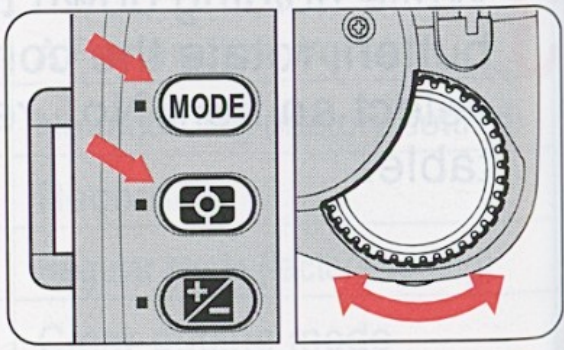
—*Set the Main dial to PV for shooting in the preview mode. The image can be previewed each time you press the shutter release button.*

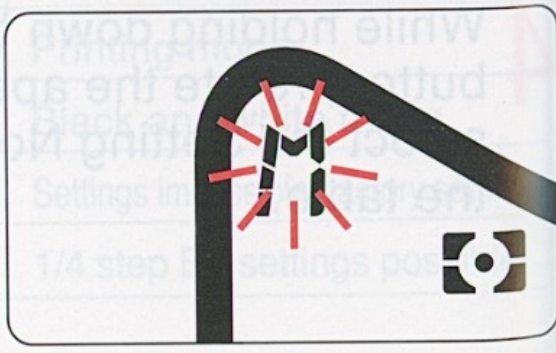
1 While pressing the Main dial lock-release button, rotate the Main dial to S, C, or PV.



2 While pressing the MODE button and the metering system button simultaneously, rotate the command dial until the exposure mode indicator M starts to blink on the LCD panel.

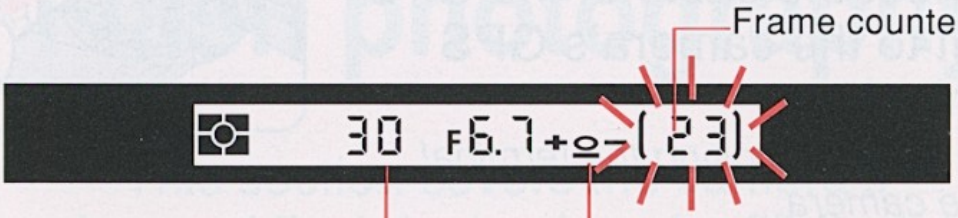
—*You can rotate the command dial in either direction. If the dial is rotated in the opposite direction while it is blinking, the exposure mode returns to the previously set mode (P, S, A or M) and the indicator lights up.*



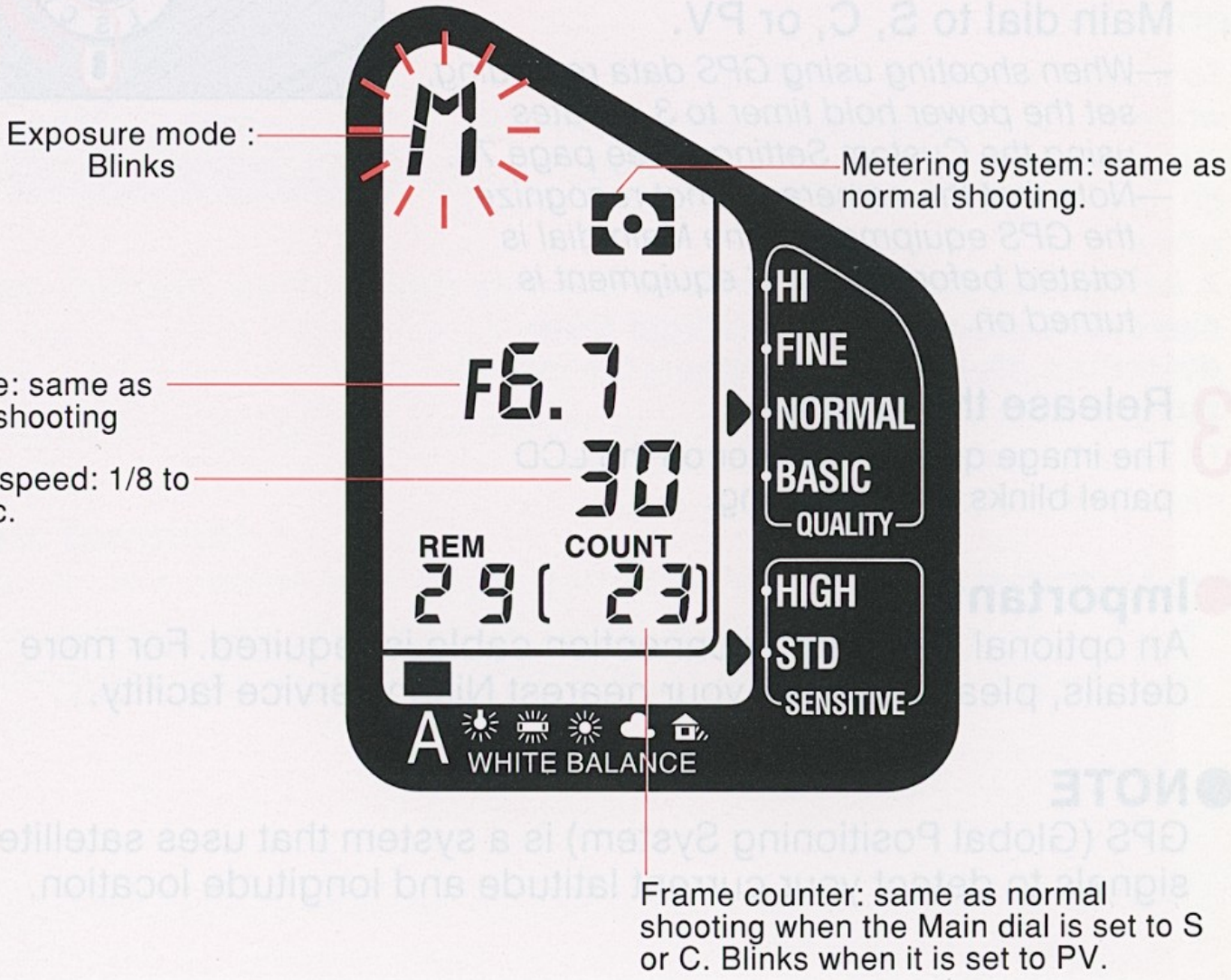


Viewfinder indications

—No indicators appear in the viewfinder, if a lens is not mounted.



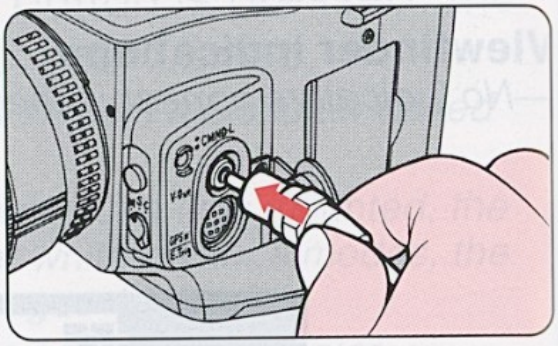
LCD panel indications



and date, can be recorded on each frame.

1 Rotate the Main dial to L (power off) and turn off the GPS equipment (with no battery pack inserted). Then connect the cable of the GPS equipment to the camera's GPS input terminal.

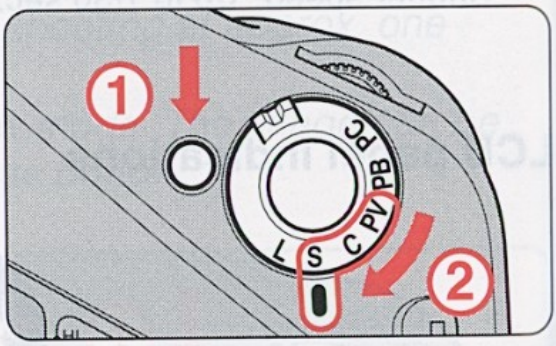
—See page 10 for removing the terminal cap on the camera.



2 After turning on the GPS equipment, insert the battery pack, then press the Main dial lock-release button as you rotate the Main dial to S, C, or PV.

—When shooting using GPS data recording, set the power hold timer to 3 minutes using the Custom Settings. See page 78.

—Note that the camera will not recognize the GPS equipment, if the Main dial is rotated before the GPS equipment is turned on.



3 Release the shutter.

The image quality indicator on the LCD panel blinks while shooting.

Important

An optional dedicated connection cable is required. For more details, please contact your nearest Nikon service facility.

NOTE

GPS (Global Positioning System) is a system that uses satellite signals to detect your current latitude and longitude location.

Flash photography

This section covers the camera's advanced flash technology for fill-flash in backlit scenes, brightening dull scenes, and various other picture taking situations.

recommended for use with this camera.

—*Nikon Speedlights SB-20, SB-22, and SB-23 can also be used with this camera.*

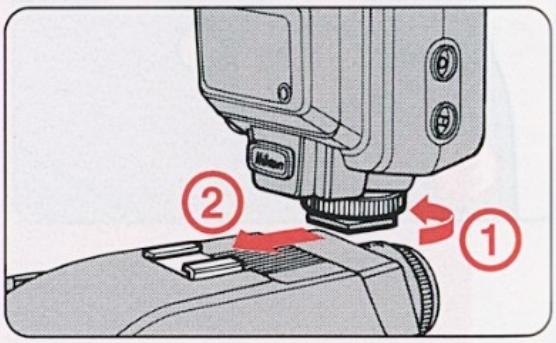
—*Nikon Speedlight SB-24 is not recommended due to a difference in color temperature setting.*

●CAUTION

The accessory shoe is designed for Nikon dedicated Speedlights. Do not use models from other manufacturers since higher voltages and/or extra hot shoe contacts may damage the camera.

Mounting the Speedlight

Mount the Nikon Speedlight on the accessory shoe with no sync cord connected.



- To loosen, rotate the mounting foot locking wheel in the direction of the arrow. Insert the mounting foot of the Speedlight as far as it will go, then fully secure the mounting foot locking wheel.

  A safety lock system is provided with this camera to prevent the Speedlight from detaching. Make sure you insert the mount pin into the locking hole.

- To remove the Speedlight, unfasten the mounting foot locking wheel.

●CAUTION

The Speedlight may fire unexpectedly when it is mounted on the camera with the power switch on due to static electricity.

Matrix Balanced Fill-Flash

The camera's Matrix Metering System determines correct exposure and flash illumination is automatically balanced against the scene's ambient light. This flash mode is recommended for most common flash shooting situations when the subject is backlit in the daytime or for a dark subject with a bright background at night.

Standard TTL Flash

Standard TTL flash is recommended to give more illumination to the main subject, resulting in a bright subject against a dark background. The flash output is compensated manually.

Non-TTL Auto Flash

The flash automatically fires after a flash illumination reading is taken through the light sensor on the Speedlight, instead of through the lens.

Manual Flash

You can select the flash power output and set the aperture according to the flash-to-subject distance to obtain well exposed results.

Rear-curtain sync flash

The flash fires at a later stage in the exposure, just before the rear shutter curtain starts to close to give a natural lighting effect. This is effective for highlighting the movement of subjects at a slow shutter speed.

Sync terminal

This camera comes with a sync terminal (with JIS-B type screw). When taking flash photographs using an optional sync cord, connect the sync cord to this terminal (X contact only).

notes on using Nikon Speedlights SB-26 and SB-25.
—If there is no mention of this camera in the instruction manual, refer to the F4 camera's instruction manual.

Shutter speeds slower than 1/250 sec.

Exposure mode	Shutter speed
P	1/60 to 1/250 sec. (auto)
S	1/8 to 1/250 sec. (manual)*
A	1/60 to 1/250 sec. (auto)
M	1/8 to 1/250 sec. (manual)*

*(*When the shutter speed is set to 1/350 to 1/2000 sec., it is automatically controlled at 1/250 sec.)*

Flash ready-light

If lit: Flash is ready to fire.
If blinking: Flash fires at full output when exposure is not sufficient. Reconfirm the distance between the camera and the subject or select a wider aperture.

In Manual exposure mode

You may continue to take pictures regardless of the underexposure indicators which appear in the viewfinder, (the exposure indicators refer to the amount of background light). If you decide to ignore the indicators, the major subject will be correctly exposed but the background may be underexposed.
If you wish to have both the main subject and the background correctly exposed, use slow sync flash.

(1) Set the exposure mode to S or M.
(2) Set the shutter speed and the aperture to obtain a correct exposure for both the main subject and the background; fully depress the shutter release button to take the picture.
—Use a tripod to minimize camera shake.

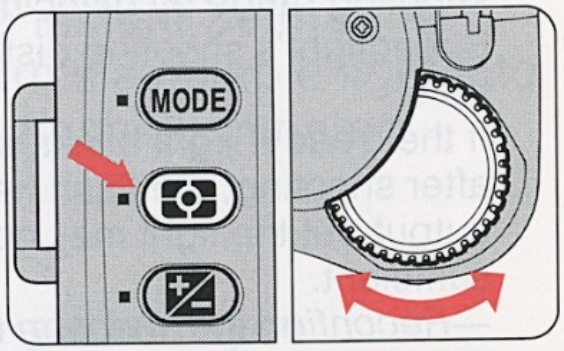
When the TTL flash output level of the Speedlight is adjuste manually, the exposure compensation mark appears in the LCD pane and viewfinder, but the compensation value does not appear.

Speedlights SB-26 and SB-25.

—For more details, read the instruction manual provided with each Speedlight model before use.

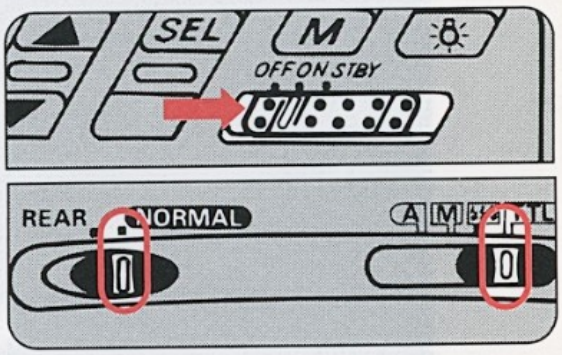
1 Set up your camera.

Set the metering system to Matrix Metering. Set other settings to the desired modes.



2 Set up your Speedlight.

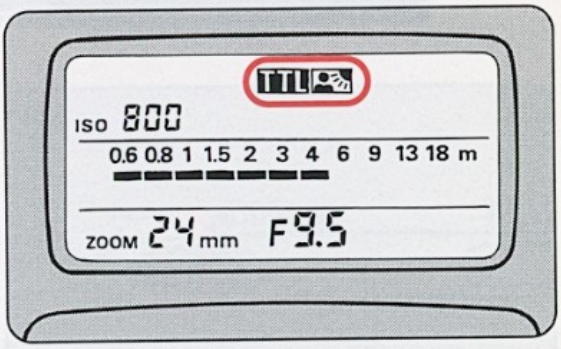
Set the power switch to STBY (standby position) or ON. Set the flash mode selector to TTL. Set the flash sync mode selector to NORMAL.



3 Confirm the settings on the LCD panel.

If the TTL flash mode indicators appear on the LCD panel, Matrix Balanced Fill Flash is selected. If the TTL indicator lights up, Standard TTL flash is selected.

—Press the [M] button to change the flash mode.



4 Press the shutter release button lightly and check the indicators in the viewfinder.

Confirm that the ready-light is lit and the subject is in focus.

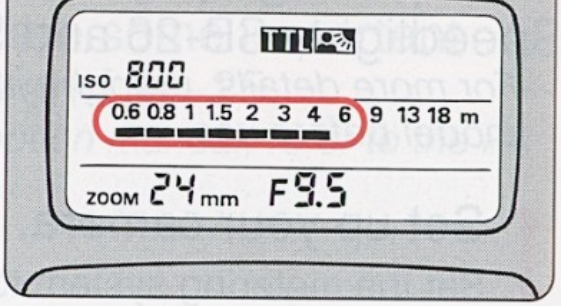
—If the exposure indicators light up, see page 67. If the exposure warning indicators appear, see page 102.

5 and release the shutter to take the picture.

Check if the subject falls within the flash shooting range by glancing at the Speedlight's shooting distance indicator bars.

If the "ready" light blinks for a few seconds after shooting, the flash has fired at full output but the light may not have been sufficient.

—*Reconfirm the shooting distance and move closer or select a wider aperture.*

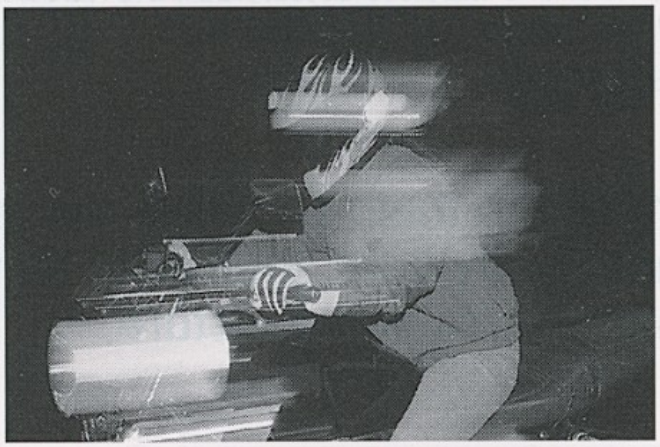


stage of exposure (front-curtain sync), resulting in unnatural light patterns at slow shutter speeds with a moving subject. With Nikon Speedlights SB-26 and SB-25, Rear-Curtain Sync is possible, where the flash is set to fire the instant before the rear-curtain begins to close. This transforms available light into a stream of light that follows the moving, flash-illuminated subject.

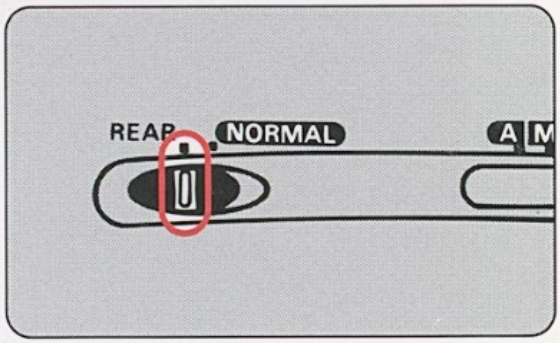
—Use a tripod to minimize camera shake.

Front-curtain sync

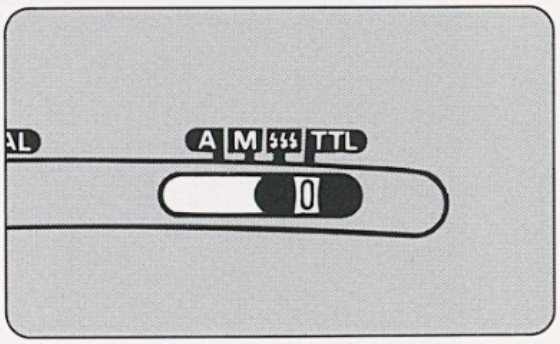
Rear-curtain sync



1 Set the Speedlight's flash sync selector to "REAR".

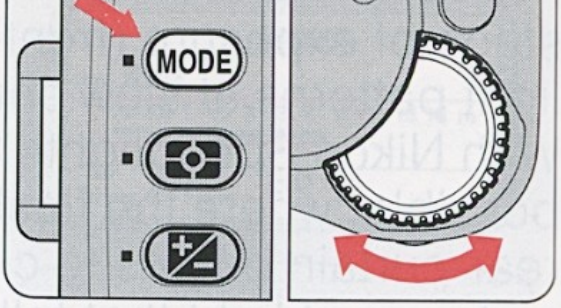


2 Set the Speedlight's flash mode selector to either TTL, A, or M.



3 S or M.

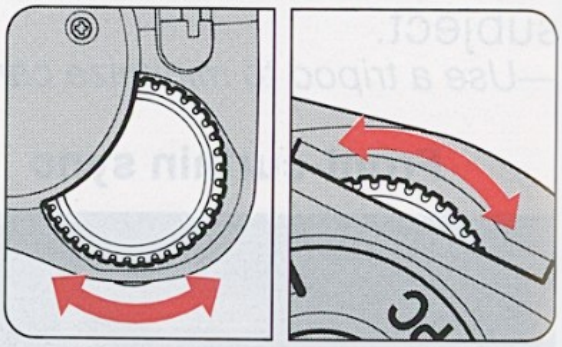
—You can select P or A exposure mode, but Shutter-Priority Auto and Manual mode are strongly recommended.



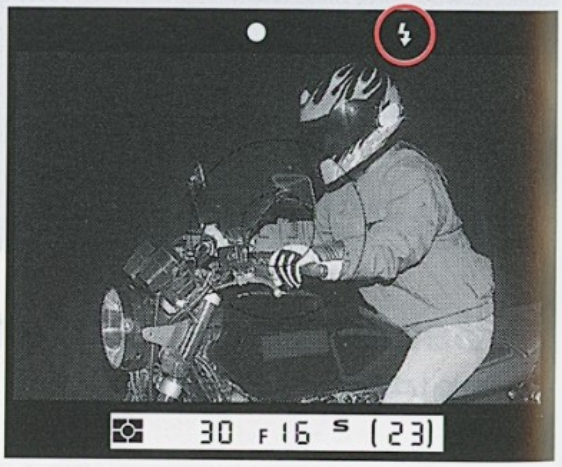
4 Set the shutter speed and aperture value.

The slower the shutter speed, the more marked the Rear-Curtain Sync effect.

—In S mode, you do not need to set the aperture.



5 Check the flash shooting range and flash ready-light, then release the shutter to take the picture.



Controls in detail

In this section we provide some useful information on a variety of photographic controls.

Most AF Nikkor lenses, AI-type Nikkor lenses and Teleconverters can be used.

Some lenses are not usable due to the performance of the E3/E3s's image size reduction optics. Refer to the separate lens compatibility chart.

Maximum lens apertures

The E3/E3s does not use the Nikkor lens' aperture for exposure control. The lens' aperture remains open all the time for the brightest viewing. Instead, an aperture is built into the camera's image reduction optics. The maximum aperture available is indicated in the following table.

Lens max. aperture	Available aperture range
f/1.2 to f/4.8	f/4.8 to f/38
Slower than f/4.8 to f/7.3	f/8 to f/38
Slower than f/7.3 to f/9.5	f/9.5 to f/38
Slower than f/9.5	Max. aperture value* to f/38

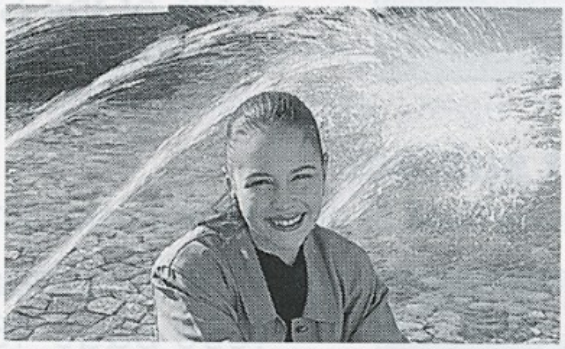
* Apertures can be set in 1/2 step increments.

- Apertures outside the above range cannot be set.
- The depth-of-field that you see in the viewfinder is controlled by the lens' aperture. The actual depth-of-field for the picture will be controlled by the image reduction optics' aperture. Therefore, the actual depth-of-field will be greater than that seen in the viewfinder.

a correct exposure. You can use shutter speed to freeze the action by using a high shutter speed, or create a motion effect by choosing a slower shutter speed. You can control depth of field by varying the aperture. Smaller apertures make the background and foreground sharper while larger apertures tend to blur the background.

Taken with a high shutter speed

Taken with a slow shutter speed



The higher the shutter speed the more effectively you can stop the action, and the slower the shutter speed the more blurry the action becomes.

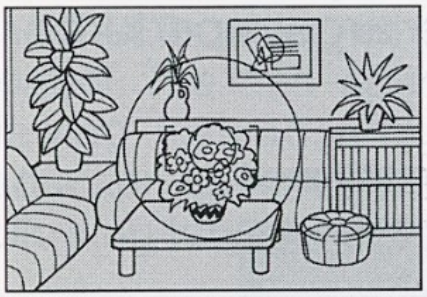
Taken with a narrow aperture

Taken with a wide aperture

Depth of field is the zone of sharpness in front of and behind the subject on which the lens is focused, and it is greatly affected by aperture.
The smaller the aperture, the more distinct the background and foreground, and the larger the aperture the sharper the main subject appears against a blurred background.

Autofocus operation depends on lighting, subject contrast, and other technical factors. In rare situations where autofocus is not possible, an "X" appears in the viewfinder signaling the need for you to focus manually with the clear matte field.

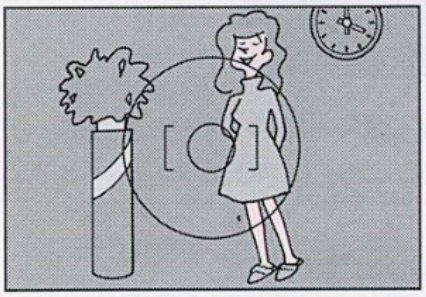
Very dark subject



- Focus manually with the clear matte field. (See page 46.)
- Use a Nikon autofocus Speedlight (optional) to perform autofocus with the help of the Speedlight's AF assist illuminator. (See page 103.)

Low-contrast subject

(against a white background or dressed in a color similar to that of the background).



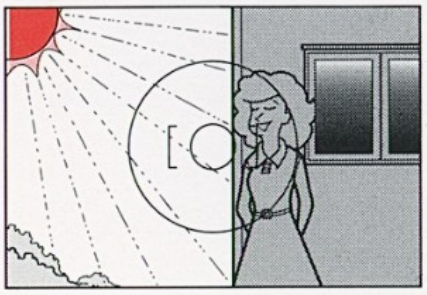
- Focus manually with the clear matte field (see page 46) or focus on another subject at the same distance but with more contrast, then use the auto focus lock. (See page 72.)

Something is behind or in front of the subject

(e.g. an animal inside a cage or a person standing next to a tree).

- Focus manually with the clear matte field (see page 46) or focus on another subject at the same distance but with more contrast, then use the auto focus lock. (See page 72.)

Subject is strongly backlit or has a bright shiny surface.



- Focus manually with the clear matte field. (See page 46.)

a personal computer using the Image Memory Card and a SCSI cable in the PC mode.

Using the Image Memory Card

To download the image data, insert an Image Memory Card (PC card) into the PC Card Drive ED-10 or a personal computer with a built-in PC card slot.

Connecting the camera to a personal computer in the PC mode

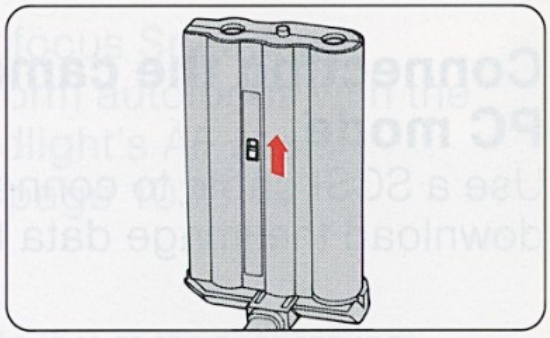
Use a SCSI cable to connect the camera to the personal computer to download the image data to the computer. (See page 54.)

When removing dirt and smudges from the camera's built-in lens (situated behind the shutter curtains), proceed in the following way.

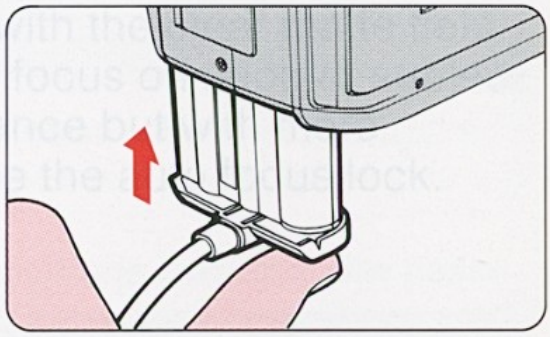
—Be sure to use DC Adaptor ES-1 (optional) and Quick Charger EH-3 (optional). You cannot use battery power for this operation.

—Read the instruction manuals provided with the DC Adaptor, Quick Charger, and the Battery Pack.

1 Set the selector switch of the DC adapter to BULB.



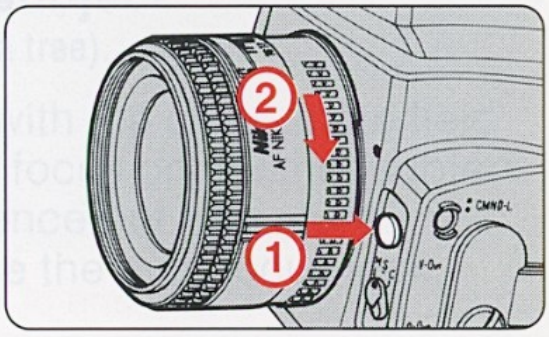
2 Connect the camera to the Quick Charger with the DC adaptor.



3 Remove the lens mounted on the camera, then turn the power on.

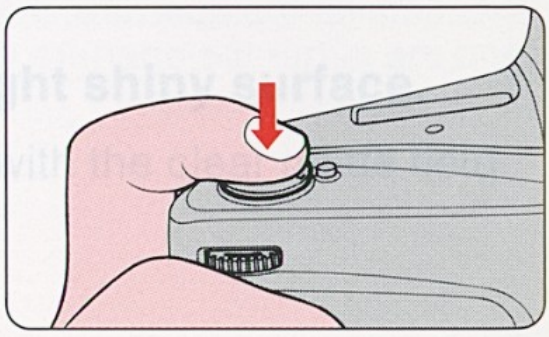
Set the Main dial to any position other than L.

—The "BULB" indicator appears on the LCD panel.



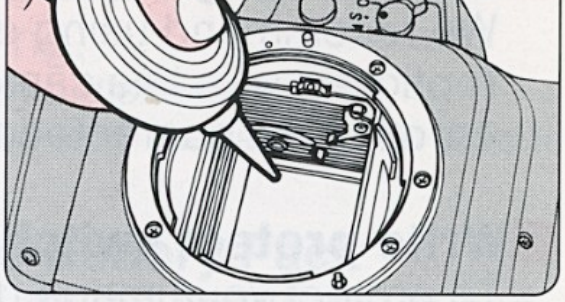
4 Depress the shutter release button.

When the shutter is released, the shutter curtains open, then the "BULB" indicator starts to blink.



5 particles from the built-in lens.

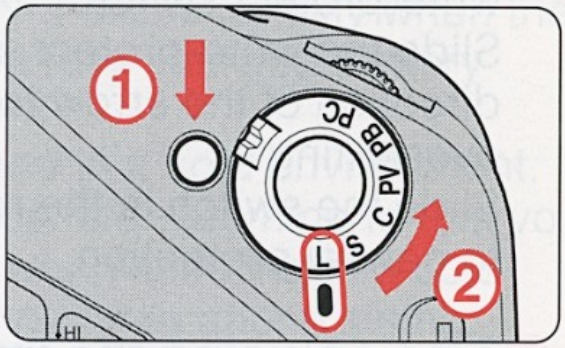
—If this proves ineffective, take your camera to an authorized Nikon Service Center.



6 Set the Main dial to L.

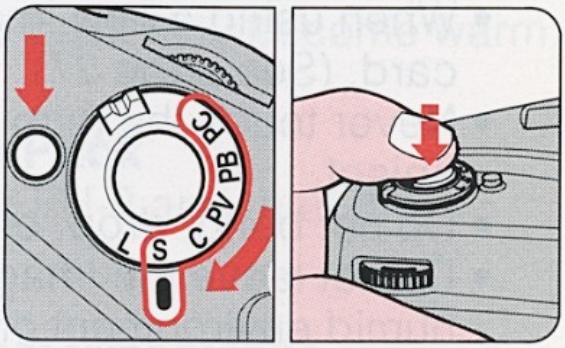
—Make sure that the camera's reflex mirror remains in the up position.

—Do not touch the shutter curtains.

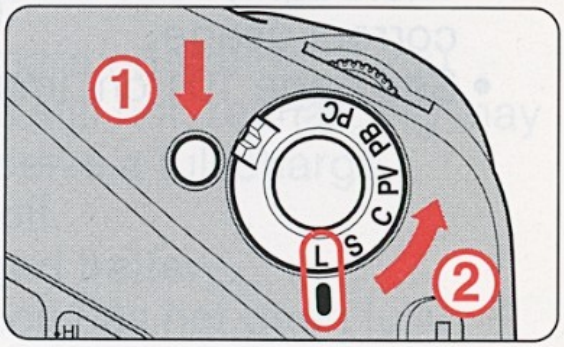


7 Set the Main dial to any position other than L and press the shutter release button halfway.

—Make sure that the camera's reflex mirror is down in the normal position.



8 Set the Main dial to L and turn the power off.

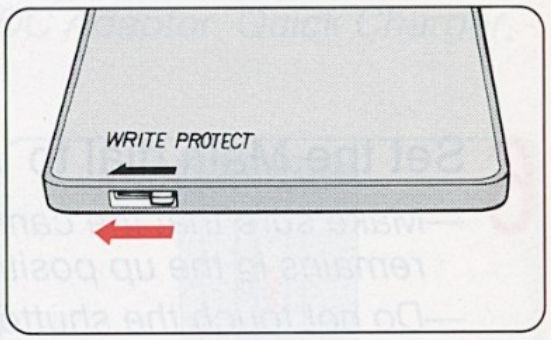


Usable Image Memory Cards

We recommend using dedicated Image Memory Card EC-15 (optional) with this camera for best performance. The use of other cards is not guaranteed by Nikon.

Write-protect switch (EC-15)

To protect your image data, use the write-protect switch.
Slide the write-protect switch in the direction of the arrow to protect against overwriting.
Slide the switch in the reverse direction to cancel protection.



Tips on using the Image Memory Card

- When using a new Image Memory Card, be sure to initialize the card. (See page 27).
- Never touch the terminals with your fingers or with a metallic object.
- Do not bend, drop, or apply physical shock to the card.
- Do not leave the Image Memory Card in an excessively hot or humid environment or in direct sunlight.
- Thoroughly read the Image Memory Card instruction manual for correct usage.
- See page 101 on Image Memory Card warning indications.

camera. Take special note of the following.

—The EN-3 contains Ni-MH (Nickel Metal Hydride) batteries.

—The battery pack was not charged when shipped from the factory. Be sure to fully charge the battery before use.

Characteristics of the Rechargeable Battery Pack

- The battery will self-discharge even though the battery is unused.
- Typically, the voltage of Battery Pack EN-3 drops quickly when the battery becomes weak. Be sure to load a fully charged battery every time you set out to take pictures.
- If the battery is weak or the camera is used in a cold environment, the number of available frames decreases. We recommend that you carry spare fully-charged battery packs when shooting in a cold environment or taking a large number of pictures at one sitting.
- Be sure to use the battery charger specified by Nikon.
- After recharging or shooting, the battery pack may become warm. This is no cause for concern.

Charging the Rechargeable Battery Pack

- Be sure to use dedicated Quick Charger EH-3 and read the instruction manual.
  —Use only the Quick Charger EH-3.
- Recharging should be done in an ambient temperature ranging from approx. 5°C to 35°C (41°F to 95°F).
- The battery may become hot during camera operation. If you attempt to recharge the battery while it's still hot, recharging may be impossible or the battery may not receive a full charge. Recharge the battery only after it cools off.
- Do not attempt to recharge a fully charged battery.
- When you recharge a Ni-MH battery which has not been fully discharged, the battery develops a "memory effect" which may prevent it from becoming fully recharged with ordinary use. To avoid this effect, you should fully discharge the battery once every 20 to 30 chargings. Please refer to your EH-3 instruction manual for further details.

Handling the battery pack safely

- Never touch the battery pack's metal portion with another metal object. Although a fuse is built into the battery pack, if the terminals are short-circuited, damage and malfunction will occur.
- Keep used battery packs away from fire and do not throw them into a fire.
- Do not try to disassemble or modify the battery pack.

Handling the battery pack for long-time use

- Do not apply strong physical force to the battery pack or drop it on a hard surface.
- Do not splash water on the battery.
- Do not continue recharging a fully charged battery pack.

Storage

- Keep the battery terminals clean.
- Store the battery pack in a cool, dry place. If the battery is left in a hot place for a long time, the battery will self-discharge or its life will be shortened.

Lifespan

- When a battery approaches the end of its lifespan, it will no longer hold a full charge despite repeated attempts to recharge it. You should replace it with a new one.

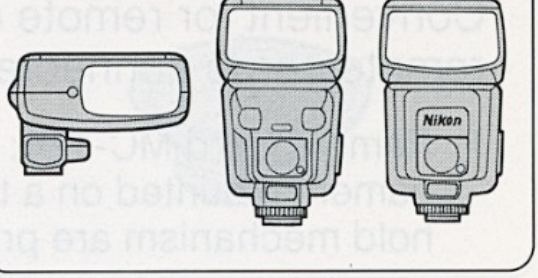
appears or blinks in the viewfinder and/or on the LCD panel to alert you. Refer to the troubleshooting charts provided below and follow the suggestion for correcting the problem before bringing your camera to a Nikon Service Center for repair.

Warning indication			Check this		Ref. page
LCD panel		Viewfinder	Cause	Remedy	
blinks		[- -] blinks	Camera back is open or camera back is closed with no Image Memory Card inside.	Insert a Nikon approved Image Memory Card. Close the camera back.	P. 26 P. 98
blinks		[E d] blinks	A write-protected Image Memory Card is inserted.	Cancel write-protection.	P. 98
blinks			An uninitialized Image Memory Card is inserted.	Initialize the Image Memory Card as instructed in this instruction manual.	P. 27
blinks			An Image Memory Card not specified by Nikon in the instruction manual is inserted.	Insert a Nikon approved Image Memory Card.	P. 98
blinks			No frames remain.	Insert a new Image Memory Card.	P. 26
blinks	BODY blinks	Display segment blinks	Camera's Ni-MH battery is weak.	Recharge the Ni-MH battery.	P. 99
	CLOCK blinks	Normal display	Lithium battery for clock is weak.	Replace the lithium battery at a Nikon Service Center.	—
blinks	BODY blinks	Display segment goes out	Camera's Ni-MH battery is exhausted.	Recharge the Ni-MH battery.	P. 99

blinks / CLOCK blinks	Normal display	is exhausted.	battery at a Nikon Service Center.	—
± appears	± appears	Exposure compensation is activated.	Cancel exposure compensation if not necessary.	P. 70
	±○= blinks	No lens is mounted.	Mount a lens.	P. 22
Err blinks (Frame position)	All indicators go out.	Indicates personal computer or printer malfunctions in PB, PC, or Pr modes.	Check all cable connection, the SCSI No. settings, or the printing paper of the printer.	P. 54
Err blinks	All indicators go out.	Camera detects a malfunction.	Bring the camera to a Nikon Service Center.	—
	ϟ blinks	Speedlight fires at full output when exposure is insufficient.	Reconfirm the distance between the camera and the subject or select a wider aperture.	P. 86
	× appears	Subject is too dark and focus is impossible.	Use autofocus assist illuminator or manual focusing.	P. 94
	◀ appears	Subject is out of focus and the area behind subject is in focus.	In manual focus mode, rotate the lens focusing ring manually so that in-focus indicator ● appears in the viewfinder.	P. 46
	▶ appears	The subject is out of focus and the area in front of the subject is in focus.		
Hi appears	Hi appears	Out of exposure control range (the subject is too bright.)	In A mode, change aperture value, and in S mode change shutter speed. Set SENS button to STD. Or use ND filter (Hi blinks) or use Speedlight (Lo blinks)	P. 65 P. 64 P. 43 P.103 P. 83
Lo appears	Lo appears	Out of exposure control range (the subject is too dark.)		

SB-26 and SB-25

Matrix Balanced Fill-Flash operation for automatically balanced flash output and ambient light, and Standard TTL Flash operation for manual flash output compensation are available. An autofocus assist illuminator is also provided to assist autofocusing in the dark.



Nikon Filters

Type		Filter designation	Filter factor		Screw-in type (mm)									Drop-in type (Series IX)	Bayonet-mount type
			Daylight	Tungsten light	39	52	58	62	72	77	82	95	122	160	
For B/W Film	Ultraviolet	L39	1			○								○	
	Yellow Light	Y44	1.5 (½)	1		○								○	
	Yellow Medium	Y48	1.7 (⅔)	1.2 (⅓)	○	○		○	○	○		○	○	○	○
	Yellow Deep	Y52	2 (1)	1.4 (½)	○	○								○	
	Orange	O56	3.5 (1⅚)	2 (1)	○	○		○	○	○		○	○	○	○
	Red	R60	8 (3)	5 (2⅓)	○	○		○	○	○		○	○	○	○
	Green Light	X0	2 (1)	1.7 (⅔)		○									
	Green Deep	X1	5 (2⅓)	3.5 (1⅚)		○									
*	Skylight	L1BC	1		○	○		○	○						○
	Neutral color	NC	1				○								
	Ultraviolet	L37C	1		○	○		○	○	○	○	○	○	○	○
For Both Color and B/W Film (for special effects)	Circular Polarizing	C-PL	2~4 (1~2)			○		○	○	○					
	Soft filters	No. 1	1			○		○	○						
		No. 2	1			○		○	○						
	Neutral Density	ND2X	2		○										
		ND4X	4		○	○			○						
		ND8X	8		○	○									
		ND400X	400			○									
For Color Film	Amber Light	A2	1.2 (⅓)		○	○		○	○	○					○
	Amber Deep	A12	2 (1)		○	○		○							
	Blue Light	B2	1.2 (⅓)		○	○		○	○	○					○
	Blue Medium	B8	1.6 (⅔)		○	○									
	Blue Deep	B12	2.2 (1⅙)		○	○		○							

*For Both Color and B/W Film

1. Conventional polarizing filters cannot be used due to the characteristics of this camera's metering system. Use circular polarizing filters.
2. To protect the lens surface from dirt or damage, the use of an NC filter is recommended.
3. When using ND-8, ND-4, R60 or O56 filters with exposure factors, Center-Weighted metering is recommended.
4. Remove filters when shooting a backlit subject.
5. In practice only the R60 filter requires exposure compensation. Overexpose by one f/stop when shooting under the tungsten light using an R60 filter.

Nikon Remote Control Accessories

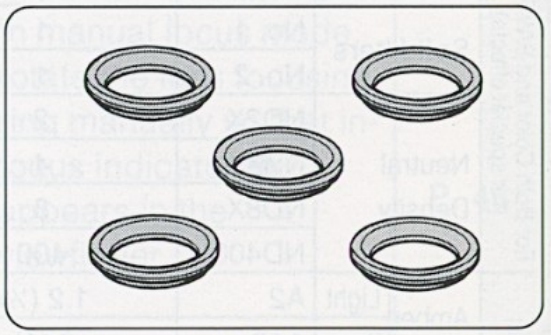
Convenient for remote or unmanned operation using the following remote cords connected to the camera's remote terminal.

1) Remote Cord MC-12B: Convenient for stable close-up shooting with the camera mounted on a tripod. Power-hold timer capability and release-hold mechanism are provided. The MC-12B is 80 cm (2.6 ft.) long.
2) Remote Cord MC-4A: Convenient for long distant remote shooting by connecting several remote cords.
3) Radio Control Set MW-2: Enables wireless remote operation of cameras at distances up to approx. 0.7 km (outside the city) and approx. 0.3 km (in the city). Power-hold capability is provided.
4) Intervalometer MT-2: Provides single or continuous frame time-lapse shooting. A pulse delay time setting switch is provided which activates when the shutter release button is pressed halfway.
5) Modulite Remote Control Set ML-2: Enables automatic remote control using modulated light for distances up to approx. 100m. Using more than one ML-2, remote control is possible from more than 100m.

Nikon Lens hood

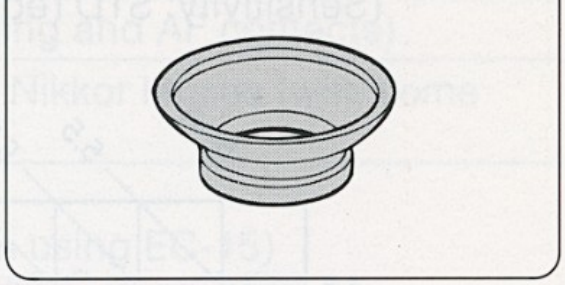
Used to prevent light from entering the lens from the side. Dedicated hood for each lens and lens hood for several lenses in common are available.

Nikon Eyepiece Correction Lenses



An easy-to-use viewing and focusing aid for near and far-sighted photographers which attaches to the viewfinder eyepiece. Five types of correction lenses ranging from +2, +1, 0, −2, and −3 diopter are available. (These figures do not refer to the diopter of the lens itself. Be sure to try out these lenses at the camera shop as diopter compensation differs from person to person.)

Attached to the viewfinder eyepiece, the rubber eyecup increases viewing comfort, eliminates eye fatigue, and prevents stray light from entering the viewfinder from the rear.



Nikon Eyepiece Adaptor DK-7

Enables attachment of the Eyepiece Magnifier DG-2 to the finder eyepiece.

Nikon Close-up accessories

The following close-up accessories are available:

- Close-up attachment lenses: No. 0, No. 1, No. 2, No. 3T, No. 4T, No. 5T, and No. 6T
- Auto extension rings: PK-11A, PK-12, PK-13, and PN-11
  —*Vignetting may occur around the edges of the frame.*

Required accessories

Nikon Rechargeable Battery Pack EN-3

Dedicated rechargeable battery pack for use with this camera.

Quick Charger EH-3/DC Adaptor ES-1

Recharges battery pack EN-3 in approx. 60 minutes. DC power can also be supplied to the camera through DC Adaptor ES-1 from an AC outlet. The EH-3 is to be used only with the ES-1 and the EN-3.

External Sync Adaptor EX-10

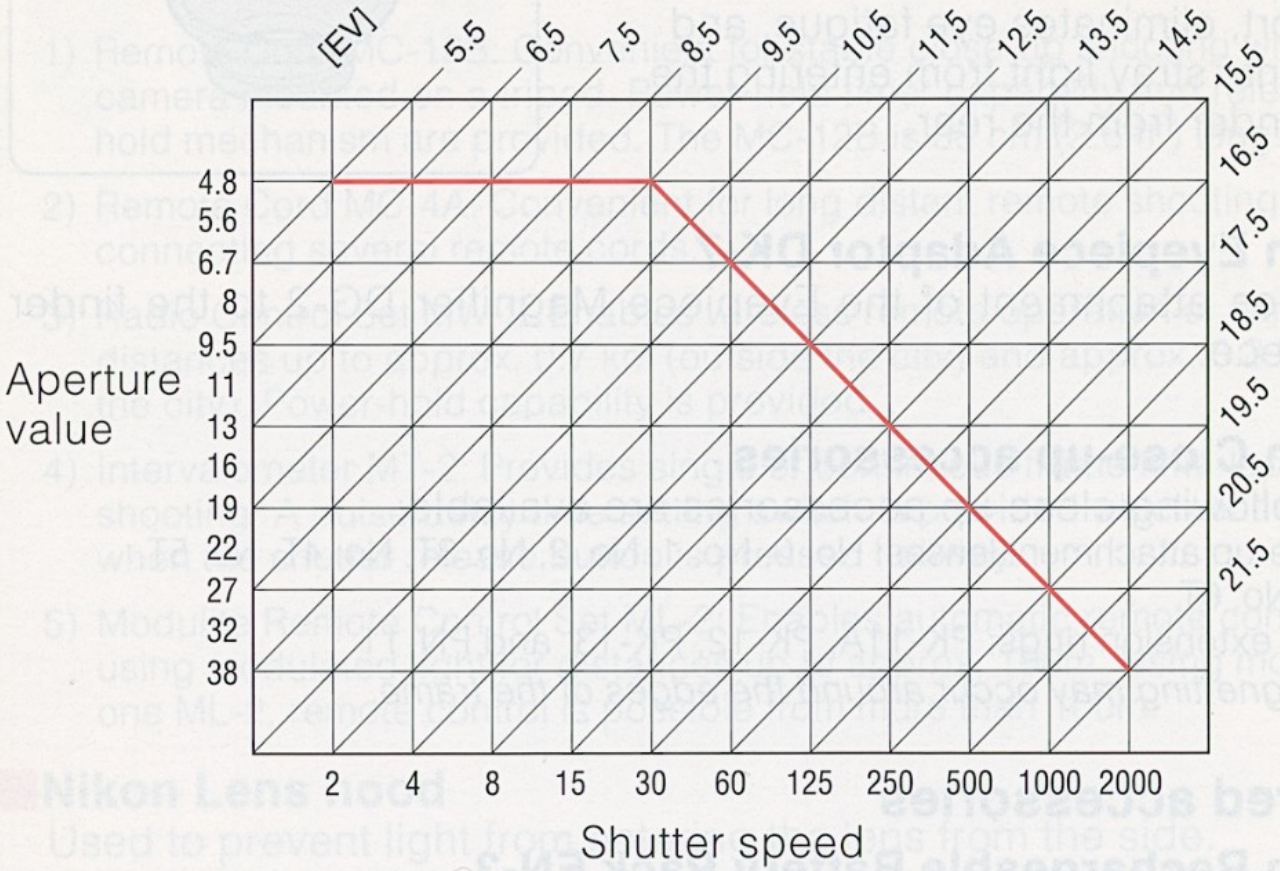
Plugs into the camera's terminal for flash shooting in sync. with the firing of a flash mounted on another camera.

Image Memory Card EC-15

Dedicated ATA PC card for recording image data with this camera.

In Programmed Auto mode

(Sensitivity: STD (equivalent to ISO 800), AF50mm f/1.4 lens)



Type of camera	Interchangeable-lens SLR-type digital camera
Lens mount	Nikon F mount (with AF coupling and AF contacts)
Usable lenses	AF Nikkor lenses and AI-type Nikkor lenses (with some exceptions)
Shooting mode	S: Single frame shooting C: Continuous shooting (when using EC-15) Approx. 1 frame/sec. (in BASIC mode)(E3) Approx. 3 frames/sec. up to 12 frames continuously (E3s only). PV (preview mode): For monitoring shooting image (Image data can be downloaded to the Image Memory Card) PB: Playback mode PC: Personal computer, printer connecting mode
Exposure control mode	P: Programmed Auto S: Shutter-Priority Auto A: Aperture-Priority Auto M: Manual
Exposure metering system	• TTL Matrix Metering using a multi-segment sensor (5 segments) with vertical sensors • TTL Center-Weighted Metering concentrating 70% of the meter's sensitivity into the center of the viewfinder. • TTL Spot Metering the area metered is represented by the approx. 5mm-diameter circle in the center of the viewfinder.
Metering range	EV1 to EV20 (at equivalent to ISO 100 with f/1.4 lens) EV2 to EV20 (in Spot Metering) EV1 to EV16-1/3 (in Matrix Metering)
Exposure compensation	With the exposure compensation button; ±2EV range, in 1/4EV increments (Exposure compensation mark appears in the viewfinder.)
Auto Exposure Lock	BV memory system with AE-L button
Shutter	Electromagnetically controlled vertical-travel focal-plane shutter (shutter balancer incorporated)
Shutter speeds	Controlled speed from 1/8 to 1/2000 sec., Sy
Viewfinder	Optical eye-level type, with approx. 98% frame coverage
Viewfinder magnification	Approx. 0.7x

Focusing screen	Dedicated Type B clear matte field with focus brackets
Viewfinder information	By LCD—Metering system, Shutter speed, Aperture, Exposure indicators, Exposure modes, Frame counter By LED—Focus indicators (in-focus, front-focus, rear-focus), Exposure compensation mark, Flash-ready light (lights up when charging is completed, and blinks to alert the subject is out of the flash shooting range when used with SB-28, SB-27, SB-26 or SB-25)
Reflex mirror	Automatic, instant-return type
Autofocus	TTL phase detection system using Nikon advanced AM200 autofocus module
Autofocus detection range	Approx. EV-1 to EV18 at ISO equivalent 100 (under Nikon inspection conditions)
Autofocus actuation method	Single-Servo AF mode (S) Continuous-Servo AF mode (C) Manual Focus (M) mode
Autofocus lock	By lightly pressing the shutter release button in Single-Servo AF mode or by using AF-L button (AE and AF are simultaneously locked by using AF/AE-L (double lock) lever)
Image pickup device	2/3 inch VT (Vacant Transfer) system color CCD with effective 1,300,000 pixel resolution
Sensitivity	ISO equivalent 800 (STD), 1600 (MID) and 3200 (HIGH) switchable
Image recording system	Digital recording on PCMCIA compatible PC card in either compressed or non-compressed format
No. of frames (Image Memory Card EC-15)	Approx. 5 (HI mode, non-compressed) Approx. 43 (NORMAL mode, 1/8 compressed), Approx. 21 (FINE mode, 1/4 compression), Approx. 84 (BASIC mode, 1/16 compresion)
LCD panel information	Exposure mode, Image Memory Card, Battery, Aperture, Shutter speed, Lock indicator, Frames-remaining counter, Exposure compensation, Metering system, Image quality, Frames-shot counter, Sensitivity, White balance mode, date/time
Flash synchronization	X-contact only; shutter operates at 1/250 sec. or slower; in Shutter-Priority Auto or Manual exposure mode, shutter can be set to 1/250 sec. or slower; (Shutter cannot be set to 1/350 to 1/2000 sec.) With Nikon Speedlight SB-28, SB-27, SB-26 or SB-25, Matrix Balanced Fill-Flash and Standard TTL Flash operations are possible.
Video output terminal	Pin Jack, 1V p-p, 75 Ω, unbalanced, sync negative

SCSI terminal	Dsub 25 pin
Accessory shoe	• Hot shoe (flash, monitor preflash, TTL flash, ready-light contacts) • Safety lock system (a mount pin is automatically inserted into the locking hole in accessory shoe to secure Speedlight on the accessory shoe.)
Tripod socket	1/4 in. (JIS standard)
Power source	• Nikon dedicated Rechargeable Battery Pack EN-3 or DC Adaptor ES-1 Voltage: 7.2V Recharging time: Approx. 1 hour Power capacity: 1150mAh • Quick Charger EH-3/DC Adaptor ES-1
Checking battery power	With the power on, if ▭◢ on LCD panel and display segment in viewfinder blink, battery is weak. If ▭◢ on LCD panel blinks and display segment in viewfinder goes out, battery is exhausted.
Operating temperature	0°C to + 40°C (32°F to 104°F)
Operating humidity	80% or less (no condensation)
Dimensions (WxHxD)	164.1 x 152.6 x 120.2mm (6.5 x 6.0 x 4.7 in.) (E3/E3s)
Weight	Approx. 1,850g (4.07 lb.) (E3) / 1,860g (4.1 lb.) (E3s) (including battery)
Required accessories	Rechargeable Battery Pack EN-3 Quick Charger EH-3 DC Adaptor ES-1 External Sync Adaptor EX-10 Video Cable EG-10 Image Memory Card EC-15

All specifications apply when a fully charged Battery Pack is used, at normal temperature (20°C or 68°F). Specifications and design are subject to change without notice.

A

A (aperture-priority auto exposure mode) ····37
A (auto white balance mode) ····40
A variety of photographic techniques ····63
Accessory shoe ····84
Adjust the eyepoint ····33
Adjusting white balance ····40
Advanced photography ····63
AF Nikkor lenses ····92
AF-L ····73
AF-L button ····73
AF/AE-L ····69
AF/AE-L lever ····69
AI-type Nikkor lenses ····92
Aperture dial ····65
Aperture-priority auto exposure mode ····37
ATA card ····13
Auto exposure bracketing mode ····74
Auto exposure lock button (AE-L button) ····69
Auto focus lock ····44
Autofocus assist illuminator ····103
Autofocus is not possible ····94
Autofocus with main subject off-center ····72
Available Nikon speedlights ····84

B

BASIC ····39
Basic camera settings ····30
Batch erasing ····53
Battery eject lever ····23
Body cap ····22
Bulb ····96

C

C (continuous servo autofocus) ····44
C (continuous shooting mode) ····36
Camera's remote terminal ····77
Card slot ····26
Center-weighted metering ····38
Charging the rechargeable battery pack ····99
Checking battery power ····24
Checking the current data ····25
Cleaning the camera's built-in lens ····96
Cloudy mode ····41
CMND-L button ····48
Color temperature ····42
Command dial ····31
Command lock ····48
Command lock indication ····48
Composing the picture ····33
Compressed record ····17
Contents ····14
Continuous servo autofocus ····44
CPU contacts ····22
Custom setting mode ····79
Custom settings ····78

D

DATE button ····25
Date and time ····25
DC adaptor ····20
Dedicated accessories ····20
Depth of field ····93
Displaying shooting data ····50
Double lock ····69
Downloading image data ····95

E

E. Trig 10
E.Trig. terminal 76
EC-15 20
EH-3 20
Eject knob lock-release button 26
Electronic rangefinder 46
EN-3 20
Ensuring proper white balance 40
ERASE 53
Erasing data in the image memory card 53
Erasing the data frame by frame 53
ES-1 20
EV chart for flash photography 106
EX-10 76
Exposure compensation button 70
Exposure compensation indication 18
Exposure compensation value 70
Exposure indicators 67
Exposure mode 37
External sync adaptor 105
External sync flash indication 76
External sync-flash shooting 76
Eyepiece 33
Eyepiece adaptor 105

F

FINE 39
Fine mode 41
Flash mode 41
Flash photography 83
Flash ready-light 86
Fluorescent light mode 41
Focus brackets 18
Focus indicators 18
Focus mode 44
Focus mode selector 44
FORMAT 53
FORMAT button 53
Frame-remaining counter 34
Frame-shot counter 34
Front-curtain sync 89

G

GPS data recording 82

H

HI (non-compression) 39
HI (out of exposure control range) 102
HIGH 43
HId (holding) 29
Holding the camera 33
ID button 28

I

Image data recording mode 17
Image memory card 98
Image memory card confirmation window 27
Image memory card eject knob 26
Image memory card indication 19
Image quality 39
In-focus indicator 44
Inc (increasing) 29
Incandescent light mode 40
Initializing (formatting) the card 27
Inserting the image memory card 26
Installing the battery 23

J

JEIDA 13
JPEG 13

L (camera power is off) 36
LCD panel 19
LCD panel indications 19
Lens compatibility chart ..... Separate sheet
Lens mounting index 22
Lens release button 22
Lo (out of exposure control range) 102
Lock indicator 19
Locking aperture value 48
Locking shutter speed 48
Long-play playback method 51
Low vibration shooting mode 80

M

M (manual exposure mode) 37
M (manual focus mode) 46
Main dial 36
Main dial lock-release button 36
Manual exposure mode 37
Manual flash 85
Manual focus mode 46
Matrix balanced fill-flash 85
Matrix metering 38
Maximum lens apertures 92
Metering 38
Metering system button 38
MODE (exposure mode) button 37
MODE 37
Mounting the lens 22
Mounting the speedlight 84
MS-DOS 13

N

Nikkor lenses 92
Nikon close-up accessories 105
Nikon eyepiece correction lenses 104
Nikon filters 103
Nikon remote control accessories 104
Nikon rubber eyecup 105
Non-compressed format 17
Non-TTL auto flash 85
NORMAL 39
Notes on using a speedlight 86
NTSC 13

O

Opening the camera back 26
Optional accessories 103
Out of exposure control range 34

P

P (programmed auto exposure mode) 37
PAL 13
PB (playback) 36
PC card 13
PC card for storing image data 17
PC mode 54
PCMCIA 13
Playback on a TV monitor 49
Playing back pictures 49
Power-hold timer 34
Pressing the shutter release button halfway 34
Preview mode 52
Printing paper 54
Programmed auto exposure mode 37

Q

QUALITY 39
QUALITY button 39
Quick charger 20

Rear-curtain sync flash mode 89
Rechargeable battery pack 20, 99
Remote photography 77
Removing the battery 23
Removing the lens 22
Required accessories 105

S

S (shutter-priority auto exposure mode) 37
S (single frame shooting) 36
S (single servo auto focus) 44
SCSI equipment 54
SCSI ID 54
Selectable aperture values 65
Selectable shutter speeds 64
SENS 43
SENS button 43
Sensitivity level 43
Setting date and time 25
Setting image quality 39
Setting the exposure mode 37
Setting the focus mode 44
Setting the main dial 36
Setting the metering systems 38
Setting the sensitivity level 43
Setting white balance compensation 41
Shade mode (fine weather) 41
Shutter-priority auto exposure mode 37
Single servo autofocus 44
Slow sync flash 86
Specifications 107
Speedlights 103
Spot metering 38
Standard TTL flash 85
STD (standard) 43
Switching the NTSC/PAL systems 50
Sy (sync) 76
System chart 16

Taking flash pictures in TTL auto flash mode 87
TIFF 13
To cancel exposure compensation 70
TV monitor 49
Two-button reset 47

U

Usable lenses 92
User ID number 28
User ID number "Holding" mode 29
User ID number "Increasing" mode 29
Using AE-L(auto exposure lock) 68
Using AF/AE-L(double lock) 69
Using exposure compensation 70
Using manual exposure 71
Using manual exposure mode 66
Using programmed auto exposure mode 31
Using the aperture-priority auto exposure mode 65
Using the shutter-priority auto exposure mode 64

V

V-Out (video output) 49
Video cable 49
Viewfinder indications 18
Viewfinder indications in autofocus modes 45

W

W. BAL (white balance) 40
Warning indication 101
Warning indication in the viewfinder 101
Warranty/registration cards 12
White balance 42
White balance button 40
Write-protect 98
Write-protect switch 98

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